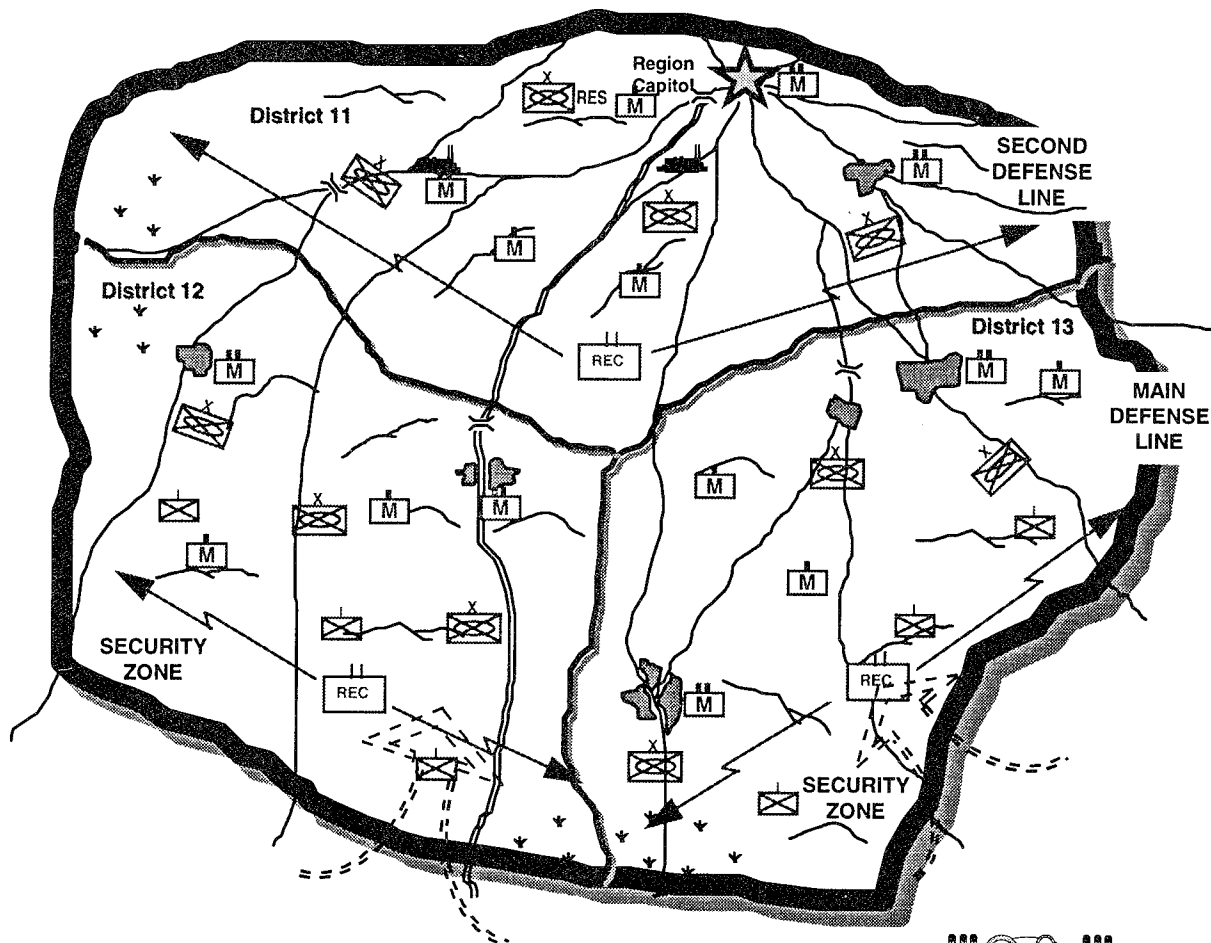
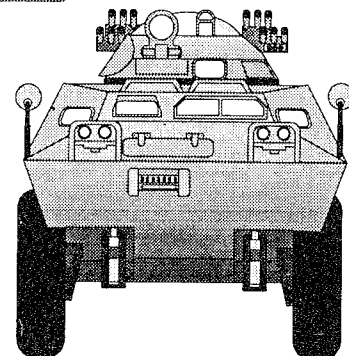


U.S. Army Training and Doctrine Command



LIGHT OPPOSING FORCE (OPFOR) OPERATIONAL ART HANDBOOK



19960220 121

TRADOC
Deputy Chief of Staff for Intelligence

EXCLUDED FROM AUTOMATIC
DOWNGRADING AND
DECLASSIFICATION
SCHEDULE

DRAFT

TRADOC Pamphlet 350-15

DEPARTMENT OF THE ARMY
HEADQUARTERS
U.S. ARMY TRAINING AND DOCTRINE COMMAND
Deputy Chief of Staff for Intelligence (DCSINT)
Fort Monroe, Virginia 23651-5000

15 September 1994

Training

Light Opposing Force (OPFOR) Operational Art Handbook

Preface

This handbook is the fourth in a series of six Training and Doctrine Command Pamphlets that documents the capabilities-based OPFOR model. The capabilities-based OPFOR model will become the basis for the forces and doctrine used by the OPFOR units at the Combat Training Centers (CTC) and in the TRADOC Common Teaching Scenario.

The proponent for this pamphlet is the TRADOC Deputy Chief of Staff for Intelligence. This pamphlet serves as the **coordinating draft** for the handbook's final publication as a Department of the Army Information Pamphlet. Users are encouraged to send comments and suggested improvements on DA Form 2028 (Recommended Changes to Publications and Blank Forms) directly to the TRADOC ODCSINT, Threat Support Division, ATTN: ATZL-CST, Fort Leavenworth, Kansas 66027-5310. Suggested improvements may also be submitted using DA Form 1045 (Army Ideas for Excellence Program (AIEP) Proposal).

Unless otherwise stated, whenever the masculine gender is used, both men and women are included.

DISTRIBUTION RESTRICTION: Approved for public release; distribution is unlimited.

DRAFT

Introduction

Concept

This Operational Art handbook is one in a series of six Training and Doctrine Command Pamphlets which document the capabilities-based Opposing Force (OPFOR) model. This model was developed to provide a flexible training threat which can be tailored to represent a wide range of potential threat capabilities and organizations. The model features a heavy and a light OPFOR package, each containing three documents: an organization guide, an operations handbook and a tactics handbook.

The capabilities-based OPFOR model represents a break from past practice in two principal respects. First, while the heavy and light packages are based on the doctrine and organization of foreign armies, they are not simply unclassified handbooks on the forces of a particular nation. The OPFOR packages are composites which were deliberately constructed to provide a wide range of capabilities. Second, the packages are not associated with a fixed order of battle but, rather, provide the building blocks from which a large number of potential orders of battle can be derived.

The capabilities-based OPFOR model will become the basis for the forces and doctrine used by the OPFOR units at the Combat Training Centers (CTC) and in the TRADOC Common Teaching Scenarios. The heavy and light packages were designed to accommodate the existing CTC OPFORs at the time of publication with relatively minor changes but have the flexibility to adapt to the changing training requirements of the force-projection Army.

Light OPFOR Package

The Light OPFOR is based on the military forces of a number of third-world countries. Although influenced by the forces of the Former Soviet Union (FSU), it is clearly unique. A certain degree of extrapolation is required since doctrine for most of these countries is so poorly documented. Since this is OPFOR doctrine, and therefore not tied dogmatically to a single source country, the doctrine can be more fully articulated than in the past. Organizationally, the Light OPFOR takes a "building block" approach, which provides a great deal of flexibility.

Light OPFOR Operational Art Handbook

The Light OPFOR Operational Art Handbook is the second volume of the capabilities-based Light OPFOR series of handbooks. This handbook provides the customer with an operational overview of the Light OPFOR and is designed to be used with the Light OPFOR Organization Guide. It is not intended to be an order of battle for any country or scenario. Instead the packages provide the building blocks from which a variety of potential orders of battle can be derived. The Light OPFOR Operational Art Handbook is intended to provide the trainer with a standardized flexible training threat designed to stress any or all battlefield operating systems.

The topics covered in the Operational Art Handbook include: military thought, organization for combat, command and control, offensive operations, defensive operations, fire support, air and air defense operations, combat support operations, logistics and rear area security, special operations, airborne and air assault operations, naval operations and amphibious landings, and partisan operations.

Equipment

Former Soviet systems provide the equipment baseline for the OPFOR. This was done for two primary reasons. First, many potential countries are equipped predominately with FSU systems which are widely proliferated throughout the world. Second, the equipment listed in the Light OPFOR Organization Guide is intended to be representative of a units capability. Using these familiar, well-documented systems paints an immediate, concrete picture, whereas listing generic descriptors would not. The use of "gray" systems and substitution matrices is discussed in detail in the Light OPFOR Organization Guide.

Structure

The Light OPFOR Operational Art Handbook defines doctrine and discusses how the capability-based Light OPFOR will fight. The Light OPFOR is a country referred to as the State, divided geographically into an unspecified number of military regions, each with a number of subordinate military districts. Most combat forces are stationed within the military districts, which can vary widely in their strengths and capabilities.

District strength could range from a single separate light infantry brigade to a mechanized infantry division. Well-equipped districts equate roughly to divisions whereas a well-equipped region would equate roughly to an army. The State can mobilize forces to form a single expeditionary army to conduct an operational level offensive. It is a highly mobile, lethal force. The primary role envisioned for the expeditionary army is conducting extraterritorial offensive operations. It is designed to strike throughout the entire tactical-operation depths of the enemy through a combination of operational maneuver and fires. If the trainer finds himself requiring multiple standing divisions and armies, it may be that the Heavy OPFOR Package better suits his training needs.

Subordinate to the Ministry of Defense, all army of the armed forces are controlled by the General Staff/National Headquarters, which also control a centralized pool of national assets. These assets include a wide variety of combat support and combat service support units which may be allocated to subordinate regions and districts, or held at the national level. Like the military regions and districts, most of these assets are not limited to a specific number. Their inclusion in the guide merely provides the option for, but does not mandate, their inclusion in any developed order of battle. From the single brigade within a district to the pool of assets at the national level, the size of the force needed to facilitate training is the determining factor in sizing the OPFOR. How these units are integrated into the wartime structure, their doctrine, and how they fight and sustain is addressed in the Light OPFOR Operational Art Handbook.

Light Opposing Force (OPFOR) Operational Art Handbook

Table of Contents

Preface	i
Introduction	ii
 Chapter 1 Military Thought	1-1
Background.....	1-1
Military Doctrine	1-2
Military Science.....	1-3
Military Art.....	1-3
People's War.....	1-8
 Chapter 2 Organization for Combat	2-1
Ministry of Defense (MINDEF)	2-1
General Staff/National Headquarters	2-2
Ground Forces.....	2-2
Navy	2-14
Air Defense and Air Defense Command	2-14
Special Operations Command	2-15
Ministry of the Interior (MININT).....	2-15
 Chapter 3 Command and Control	3-1
National Military Command Authority	3-1
Theater of Military Operations	3-2
Command and Control System.....	3-3
Ground Force Command and Control: Regions and Districts	3-7
Command and Control of Other Branches of the Armed Forces.....	3-14
 Chapter 4 Offensive Operations	4-1
Offensive Phasing.....	4-1
Offensive Planning	4-3
Reasons for Assuming the Offensive.....	4-3
Fundamentals of Offense	4-4
Operational Concept: Expeditionary Army Offensive.....	4-9
 Chapter 5 Defensive Operations	5-1
Assuming the Defense	5-1
Fundamentals of Defense.....	5-1
Forms and Types of Defense	5-3

	Operational Concept: Military Region Area Defense.....	5-5
	Tactical Concept: Military District Area Defense	5-10
	Operational Concept: Expeditionary Army Area Defense.....	5-16
	Tactical Concept: Division Area Defense.....	5-30
	Expeditionary Army Counterattack	5-29
	Withdrawal	5-30
Chapter 6	Fire Support	6-1
	Concept for Fire Support	6-1
	Fire Support Assets	6-1
	Fire Support Planning	6-2
	Target Damage Criteria.....	6-3
	Phases of Fire Support	6-3
	Fire Support Planning	6-7
	Artillery Fire Support.....	6-8
	Organization for Combat	6-10
	Fire Control.....	6-12
	Methods of Fire.....	6-12
	Offensive Fires.....	6-14
	Defensive Fires	6-16
	Support in the Offense	6-17
	Support in the Defense.....	6-18
	AT Fire Support.....	6-19
Chapter 7	Air and Air Defense Operations	7-1
	Air Force	7-1
	Aviation Employment.....	7-2
	Air Support in the Offensive.....	7-5
	Air Support in the Defense	7-7
	Air Defense Operations	7-7
	Command and Control.....	7-8
	Strategic Air Defense.....	7-10
	Tactical Air Defense	7-15
	Support in the Offense	7-18
	Support in the Defense.....	7-19
	Air Defense Ambushes	7-19
Chapter 8	Combat Support Operations	8-1
	Reconnaissance	8-1
	Radioelectronic Combat (REC)	8-14
	Engineer Support	8-16
	NBC Operations.....	8-21
	Smoke	8-24

Chapter 9	Logistics and Rear Area Security	9-1
	Background.....	9-1
	OPFOR Logistics Principles.....	9-2
	Logistics Stockpile.....	9-4
	Levels of Logistics Support.....	9-5
	Peacetime Logistics Support.....	9-6
	Wartime Logistics Support.....	9-8
	Maintenance.....	9-16
	Force Reconstitution.....	9-17
	Medical.....	9-18
	Rear Area Security.....	9-21
	Command and Control.....	9-23
Chapter 10	Special Operations	10-1
	Definitions.....	10-1
	Special Operations Command.....	10-1
	Special Operations Brigades.....	10-2
	Commando Battalions.....	10-6
Chapter 11	Airborne and Air Assault Operations	11-1
	Airborne Operations.....	11-1
	Air Assault Operations.....	11-7
Chapter 12	Naval Operations and Amphibious Landings	12-1
	Command, Control, and Communications.....	12-1
	Missions.....	12-1
	Amphibious Landing Operations.....	12-2
Chapter 13	Partisan Operations	13-1
	Objectives.....	13-1
	Type and Structures of Partisan Forces.....	13-1
	Command, Control, and Communications.....	13-2
	Tactics.....	13-3
	Offensive Operations.....	13-4
	Defensive Operations.....	13-9
Glossary	Glossary-1
Index	Index-1

Chapter 1

Military Thought

"The art of warfare is this: It is best to keep one's own state intact; to crush the enemy's state is only a second best. Therefore, the best military policy is to attack strategies; the next to attack alliances; the next to attack soldiers; and the worst to attack walled cities."

-Sun Tzu

BACKGROUND

OPFOR **military thought** emphasizes the primacy of the political over the military aspects of war. The OPFOR has freely borrowed from a variety of Western and Eastern sources in an attempt to develop a cohesive doctrine which supports its political ideology and national goals. History plays a dominant role in OPFOR thinking. Guerrilla warfare has also figured prominently in several successful defenses against invaders over the years, and during the revolution which gave power to the current regime. As a result, OPFOR leaders have devoted much thought to the development of doctrinal concepts for warfighting that combine both conventional and guerrilla-type warfare. OPFOR doctrine incorporates the application of regular armed forces, both in conventional and partisan operations, with a strategy of universal armed resistance to invasion known as People's War.

OPFOR political and military planners, cognizant of their national and military capabilities and limitations, have taken a practical approach to the conduct of war and the doctrine which supports it. Throughout the doctrine, they address how operations could be conducted against weaker regional powers and against stronger powers from outside the region. However practical in application, OPFOR study of war falls within a classic hierarchy of military

thought. It has very precise definitions for terms such as **war**, **armed conflict**, **military doctrine**, **military science**, **military art**, **strategy**, **operational art**, and **tactics**. Within the concept of People's War, the OPFOR has developed more finite definitions for terms often used generically, such as **guerrilla**, **partisan**, and **insurgent**. To understand OPFOR military thinking, we must know the vocabulary it uses, its military theory, and its practical application. This chapter includes definitions of OPFOR military terminology, outlines the basic theories and goals espoused by the political and military planners, and discusses key concepts which strongly influence the application of their military thought.

War and Armed Conflict

OPFOR theorists differentiate between war and armed conflict. By definition, **war** is the more comprehensive of the two, encompassing all aspects of life and society. It involves the entire country, and includes diplomatic, ideological, economic, scientific, technological, and other forms of struggle in addition to those involving actual armed combat. Therefore, the management of the war effort resides with the political leadership. **Armed conflict** is the principal form of struggle in war. However, it can also exist in the absence of a general state of war. It is the aggregate of military actions conducted to attain strategic goals, both

military and political. It relates primarily to combat activities by armed forces; thus it falls under the management of military leaders.

MILITARY DOCTRINE

Military doctrine is the highest level of military thought. It is the nation's officially accepted system of views on the nature of future war and the use of its armed forces. Doctrine has two closely interlinked aspects: the **political** and the **military**.

Political aspect

This aspect of doctrine brings together the political and military, expressing the national leadership's political policy as reflected in the government's military policy. Political objectives play the determining role in the development and refinement of military doctrine. Once handed down by the national leadership, doctrine is not open to debate. It has the effect of law. The State's political leadership has stated three predominant political objectives, which are reflected throughout OPFOR doctrine:

Maintain and Strengthen the Revolution

This statement unifies the military and civilian sectors within a common struggle. This is critical to the country's success during wartime, given the reliance within its doctrine on the People's War, which is outlined later in this chapter.

Extend the Revolution Throughout the Region

Political leaders would like to conquer neighboring countries for two basic

reasons: to unite ethnically homogeneous areas and to create buffer states. So far, extending the revolution has been limited to advising guerrilla forces operating in another country. Extending the revolution through large-scale military operations could jeopardize the OPFOR's ability to achieve the third objective (below), since it would invite superpower involvement at a time when the country would be militarily vulnerable.

Preserve and Defend the State

OPFOR doctrine is primarily one of **territorial defense**, focused on the preservation and defense of the nation. In spite of aggressive OPFOR rhetoric, the doctrine is reflected geographically within the country, which is divided into military regions further subdivided into military districts. Basics of the defense are covered in Chapter 5, Defensive Operations.

Generally, the basic tenets of OPFOR doctrine revolve around three forms of military operations: direct, partisan, and combined. **Direct operations** are conducted by regular army or militia forces in a deliberate fashion; the aim is to defeat or destroy enemy forces by traditional means. **Partisan operations** are conducted by regular army subunits, militia subunits, or militia augmented by civilians. These operations are normally associated with the People's War. The aim is to avoid decisive clashes for as long as possible, expand the number of lower-level operations, and destroy the enemy by conducting raids on enemy weak points, such as logistics and rear areas. Failure or weakening of direct operations signals the transition to **combined operations**, since the primary participants of the partisan operations will be regular army forces that have been bypassed, weakened, or attrited.

Military Aspect

The military aspect of doctrine is subordinate to the political, conforming to the social/political aims. It encompasses the following matters pertaining directly to the OPFOR:

- Organizational development.
- Training.
- Combat readiness.
- Equipment types and numbers.
- Further development of military art.
- Improvements in command and control.

Traditionally, the OPFOR has attempted to maintain a force structure which exceeds the requirements for defending the homeland. Maneuver unit disposition, coupled with a flexible support philosophy for the military regions and districts, is more than adequate to defend the homeland against any conventional regional threats. The greatest weaknesses of the OPFOR structuring methodology would occur under very specific circumstances. If the OPFOR formed an expeditionary army to conduct extraterritorial offensive operations, forming and supporting this force would place a substantial drain on maneuver units within military regions and subordinate military districts, as well as the national asset pool and other arms of the armed forces. As a result, defending the region from which the expeditionary army was launched would fall to comparably ill-equipped militia forces or to maneuver units taken from adjacent regions, unfamiliar with the terrain, or a combination of the two. Additionally, launching the expeditionary army into an adjacent country would most almost certainly invite the attention and possible intervention of a superpower.

MILITARY SCIENCE

Military science is defined as the aggregate knowledge concerning the nature of wars, the general laws and principles of armed struggle, the organizational development of the armed forces, the forms and methods of preparing for combat operations of various scope, and ways of averting wars. It is the study and analysis of the diverse phenomena related to combat. Its purpose is to develop practical recommendations for achievement of victory in war. Unlike doctrine, it is subject to academic debate. Military science categorizes military knowledge along functional lines into various theories. These are: military art, military organization, military geography, military history, military pedagogy (training and education), military economics (rear services), and command and control.

The OPFOR regards military art as the most important; therefore military art is the preeminent subcomponent of military science. Although these other areas are important parts of military science, the discussion in this chapter focuses on the theory and application of military art.

MILITARY ART

Military art is the theory and practice of conducting armed combat on land, sea, and in the air. The three components of military art are each normally related to a specific level of combat activity:

- **Military strategy** (national-level).
- **Operational art** (region- and army-level).
- **Tactics** (district- and division-level and below).

At the two extremes of strategy and tactics, the definitions are more concrete.

Traditionally, the operational level has been harder to define for the OPFOR, because it does not have the set, hierarchical structure which simplifies its application. The command echelon integrating assets from the sister services is considered operational. In most cases, this occurs at region and/or army level.

Military Strategy

Military strategy is the highest component of military art. Strategy determines the character of future war, identifies the strategic objectives necessary for victory, prepares the nation and armed forces for conflict, and includes the planning and conduct of war as a whole. Put simply, it concerns the preparation for and conduct of war to achieve national objectives. Strategy contains the basic means for achieving the political goals of war. Within the OPFOR command and control structure, the Ministry of Defense and General Staff are responsible for developing military strategy. All State ministries and military organizations, as well as the civilian population, work under a unified military strategy.

Operational Art

Operational art concerns the theory and practice of preparing for and conducting combined and independent operations by a military region or expeditionary army. It is the connecting link between strategy and tactics. Based on strategic requirements, operational art determines effective methods of using available military resources to achieve strategic goals. In turn, plans emanating from operational art determine tactical actions. Operational art is not limited to wartime.

The OPFOR is composed of four services: the Ground Forces, the Air Force (with subordinate Air Defense Command), the Navy, and the Special Operations Command. Unlike other armies, the OPFOR does not have a separate operational art for each of its services. Since the ground forces predominate the other services, the OPFOR's singular combined arms operational art focuses on the interaction between the ground forces and its sister services.

Principles of Operational Art

The OPFOR principles of operational art do not differ significantly from the published principles of other armies. Each principle is stated in a short definitional paragraph followed by another paragraph illustrating the principle's application.

Mobility

Theory. Mobility of combat operations facilitates the success of any battle or operation. The spatial scope of modern operations, the absence of solid and contiguous fronts, and the depth of the modern battlefield demand mobility. A high degree of mobility enables forces to use combat power with maximum effect.

Application. Mobility and speed are not synonymous. Depending on enemy, terrain, and weather conditions, the most mobile force may be light, motorized, mechanized, or a combination thereof. Therefore, OPFOR strategists have enhanced the overall capabilities of maneuver units by taking these considerations into account; as a result, units garrisoned within districts should normally be able to fight in that terrain type with a high degree of mobility. These same considerations drive what types of combat support and combat service sup-

port are garrisoned within the regions and districts, as well as what types they would receive from the General Staff during wartime. This tailored mobility also has aided the OPFOR in terms of utilizing specific equipment pieces. Many pieces of equipment considered obsolete by other armies, such as some older towed artillery pieces, fit easily within the mobility requirements of light and motorized forces and are well-suited for those support roles.

Tempo

Theory. Tempo is the rate of speed of military action; it is inseparably connected to mobility. Controlling or altering that rate is critical to maintaining the initiative. As with mobility, tempo and speed are not synonymous. Tempos can be either fast or slow, adjusted by commanders to ensure synchronization of assets. Generally, a quicker tempo is preferable during offensive operations, since maintaining constant pressure on the defending enemy prevents him from recovering from the initial shock of the attack, repositioning forces, and bringing up reserve forces from the depth in a timely manner. Based on successful reconnaissance and probing actions, the attacker should quickly shift his strength to widen penetrations and exploit that success. The key to success is constant, relentless pressure, which denies the enemy time to identify the attacker's main effort and concentrate his forces to blunt that effort. In defensive operations, actions should focus on disrupting the enemy's offensive tempo by denying him the ability to mass forces or move these forces with the requisite speed.

Application. OPFOR military strategists emphasize tempo, because they recognize the potential problems with synchronization during offensive operations.

No single region has the number of mobile forces required to form an expeditionary army. The region used as a base for the army's mobilization would receive standing mobile divisions from other regions at the direction of the General Staff, and perhaps mobilize reserves within the region in order to constitute the required forces. This composite force would never have fought as an army before, and its subordinate formations would vary substantially in equipment and training. During defensive operations, much of the responsibility for disrupting the enemy's offensive tempo would fall to partisan actions conducted by fragmented and/or bypassed units, both regular army and militia. As a rule, these small unit raids would focus on command and control elements, lines of communication, and supply facilities.

Concentration of Main Effort

Theory. A force which dissipates its forces and means equally across the entire frontage cannot achieve victory; this is equally true in the offense and in the defense. Concentration can be achieved by massing effects without massing large formations, and is essential to achieving and exploiting success. In the offense, attacking commanders must overcome the effects of modern technology and the modern battlefield by manipulating their concentration of forces, as well as the enemy's, through the combination of dispersion, concentration, deception, and attack. Commanders should designate the main effort, allocate or focus the forces to support it, and conceal this effort until it is too late for the enemy to react.

Application. Adherence to this principle is evident in the peacetime organization of forces, allocation of forces in preparation for war, and their tactical and operational application during wartime. The

OPFOR does not have the number of combat support and combat service support units needed to provide equal support to all maneuver elements. As discussed before, the maneuver forces garrisoned within districts have been tailored to support that district. The same is true of support assets. Some regions, and subordinate districts, may have an adequate number of combat support and combat service support units during peacetime; usually, these forces have offensive contingency missions or a perceived threat to that region or district. However, higher-level combat support and combat service support units come from the pool at the national level, and are allocated to regions by the General Staff based on their mission; regions then allocate these assets to their subordinate districts using that same rationale. The OPFOR attempts to concentrate firepower to destroy enemy formations piecemeal in both offensive and defensive operations. For example, when an enemy force deploys in several columns from several directions, the defending OPFOR can concentrate firepower in an attempt to destroy one enemy column first. Simultaneously, they can tie down his other columns with small forces in order to prevent reinforcement of the column under attack; these smaller forces may be militia, or fragmented regular army units conducting partisan-type actions in platoon- or company-sized strength.

Surprise

Theory. Commanders achieve surprise by striking the enemy when he is caught unprepared by the timing, direction, or forces used. Denying the enemy the ability to conduct good intelligence operations is critical to this effort. Knowledge of the enemy's plan is paramount. Being unpredictable is helpful, but not at the expense of

sound application of doctrinal principles. Surprise delivers victory as a result of timing, boldness, and concentration of forces masked by feints, ruses, demonstrations, and false communications.

Application. Surprise is the result of deliberate and calculated execution of an integrated system of measures designed to--

- Maintain secrecy regarding the concept of the operation.
- Exploit factors such as terrain, weather, season, and time of day within the plan.
- Mask intentions and preparations through extensive use of concealment and disinformation.
- Accurately determine the main effort, using extensive reconnaissance and counter-reconnaissance.

Even with modern advances in reconnaissance and intelligence collection capabilities, OPFOR commanders feel it is realistic at the operational level to conceal not only the scope of the operation, but the location of the main effort and the time it will begin.

Maskirovka

To achieve surprise, the OPFOR employs an organized *maskirovka* plan. This includes elements of camouflage, concealment, and general deception techniques. The OPFOR's ultimate deception goal is to mislead the enemy about--

- The presence and position of troops (forces).
 - Their composition, combat readiness, and actions.
 - The plans of the command authority.
- The simultaneous use of deception practices against all hostile reconnaissance and intel-

ligence-gathering assets achieves the greatest effect.

Initiative

Theory. Success in battle goes to the side which conducts itself more actively and resolutely. Initiative must be reflected in the goals of a campaign or battle and the methods devised for their attainment. The success of these plans rests with the ability of higher-echelon commanders to make bold decisions, then act resolutely to implement those decisions. As the development and retention of initiative relies on the planning and leadership of higher-echelon commanders, so does it also depend on the individual and collective actions of soldiers at the lower levels.

Application. The general theoretical statements above touch on the three basic definitions of initiative: initiative which is synonymous with offense and offensive action, initiative which means freedom of maneuver, and initiative which refers to actions by individuals. Of the three, OPFOR commanders rely more on individual initiative. As mentioned earlier, defending units which have been heavily attrited, fragmented, or bypassed are expected to continue fighting, conducting partisan actions as part of the larger People's War concept. Units conducting these actions are normally no larger than platoon/company-sized, often of ad hoc composition, and, unless communications with a higher headquarters can be established, are operating independently in support of the overall mission. Preparing for these contingencies constitutes a large part of small unit training in peacetime. Tactics and procedures used by these forces are detailed in Chapter 13, Partisan Operations.

Preservation of Combat Effectiveness

Theory. In the course of operations, the force's combat effectiveness must be maintained at a level which enables successful accomplishment of the mission. Measures for preserving combat effectiveness fall into four basic groups: special combat operations; protection against weapons with high destructive potential; maintenance of combat readiness; and restoration of combat effectiveness.

Application. OPFOR commanders aggressively conduct **special operations** aimed at disrupting or weakening an enemy's ability to mass destructive fires. To achieve this goal the OPFOR emphasizes aggressive reconnaissance by all means to locate and identify the enemy's fire systems. The second grouping, **protection against weapons of high destructive potential**, is tied to the first and reflects the OPFOR's concern with high-precision weaponry and the actions it must take to conceal its forces from them. The OPFOR believes it can accomplish this through the dispersal and concealment of forces and means and the periodic shifting of areas of force disposition. **Maintenance of combat readiness** refers to the high political/moral/physical state of the troops, the maintenance of equipment and weapons, and the provision of the materiel needed. The OPFOR considers the high political and moral state of individual troops to be of utmost importance. It has established political sections at every echelon of the armed forces, which work diligently to instill a high degree of political and moral awareness in the troops. How the OPFOR maintains equipment and weapons, provides for its forces, and **restore its combat effectiveness** is detailed in Chapter 9, Logistics and Rear Area Security.

Coordination

Theory. Success is achieved only through the coordinated efforts of all forces participating in an operation or battle. The combat missions of many diverse elements must be closely coordinated to ensure the mutual and complementary support of all elements involved in the operation or battle. Detailed plans and rehearsals ensure that each element fully understands its mission relative to the overall operation. Of special importance is the coordination of the efforts of unconventional forces.

Application. The OPFOR has created a doctrine integrating all forces into a cohesive, coordinated war effort. For the ground forces, coordination is more successful within standing units, such as standing divisions and separate brigades which exist and train as a force during peacetime; due to their standing command and control structure, support from other arms of the armed services integrates more smoothly. Regions and districts which create additional tactical headquarters during wartime have more difficulty for two reasons: the tactical command and control headquarters, since it normally does not exist during peacetime, is not accustomed to integrating support from other arms of the services; and forces within the region may vary, such as a region which has two districts composed of separate brigades and one district containing a standing division. Region missions may also require mobilizing reserve units within the region, which adds another layer of integrating forces unaccustomed to fighting with active ground forces. Militia integration is only as good as its ability to form as a unit; their actions may be relegated to partisan fighting in the rear. Partisan activities by weakened, fragmented, or bypassed regular army units can play a large part in the success of the

overall operation. Success depends in large measure on the initiative and daring of small unit leaders and their understanding of how their actions can contribute to the overall plan. Partisan activities can be loosely coordinated to support the overall plan, but not finely tuned in time or direct cooperation with regular units. Guerrilla activities taking place in a third country may be loosely coordinated; however, advisors for these forces are controlled through the Ministry of Defense. While they may provide general support, it is not timely or in direct support of ongoing actions by conventional forces.

PEOPLE'S WAR

If insufficient forces exist for the OPFOR to defend against an invader by conventional means, its leadership plans to integrate partisan actions in an attempt to prevent occupation. This aspect of doctrine, termed **People's War**, envisions an unconventional war fought by thousands of small units and individuals against a foreign invader, eventually forcing the invader to withdraw from the country. This aspect of OPFOR doctrine is modeled after concepts employed against the United States in Vietnam.

Strategic Objective

The strategic objective of the People's War is to prevent occupation of the country. It involves defeating the enemy through a series of small combat actions aimed at attrition of his forces, or destruction of his command and control elements, lines of communication, or logistical support.

Principles

The principles of People's War are as follows:

- The nation must support the war.
- The war must be carried out in the interior of the state.
- The theater of war must extend over a considerable area.
- The war cannot hinge on a single battle.
- Irregular, difficult, and inaccessible terrain is desirable.

Partisan Aspect

Although People's War is a much broader and comprehensive term, this handbook will focus on partisan fighting conducted in support of offensive and defensive conventional operations. Partisan actions may or may not be coordinated with concurrent conventional military operations. Although many of the tactics, techniques, and procedures used by partisan forces can be loosely termed guerrilla fighting, partisans are never termed guerrillas in OPFOR doctrine. By OPFOR definition, **guerrillas** or **guerrilla forces** operate outside the borders of their own country. When OPFOR doctrine addresses guerrillas, it either means OPFOR advisors to guerrillas operating in another country or guerrillas from another country operating within the borders of the State. Guerrillas operating within the borders of the State are termed **insurgents**. While the real distinctions may seem small, they are important to the OPFOR leadership. Using the term "partisan" to describe the actions of these differing groups lends a patriotic, unifying connotation which the term "guerrilla" does not.

Participants

Participants generally fall within one of three groups, each with distinctly different abilities. These are:

Regular army units or subunits.

These have been bypassed, fragmented, or otherwise attrited to less than 20 percent of their original combat potential. Once units reach 20 percent of their original combat potential, transition to partisan operations is planned. Subunits can hide, allowing enemy forces to bypass them, with the specific intent of conducting partisan operations. These forces range from squad- to company-size, and vary in organizational integrity. A company, for example may be either a true company or an ad hoc grouping composed of the remnants of several organizations, which would affect its ability to fight cohesively. As a rule, regular army units or subunits conducting partisan warfare normally achieve a degree of integration into the conventional fight by virtue of their familiarity with the mission and plans of the higher headquarters. These forces are the most likely to conduct operations against smaller enemy combat units.

Militia units or subunits.

These have been bypassed, fragmented, or heavily attrited, or have not had time to fully mobilize. These forces normally range from squad- to company-size, although some could be battalion-sized, depending on degree of mobilization. Effectiveness and degree of integration with the conventional fight varies widely. Militia companies or company-sized groupings which had been mobilized and previously integrated into the conventional fight, for example, would be more effective as partisans than unmobilized subunits fighting without knowledge of the conventional forces' mission and plans.

Civilians, augmenting either regular army or militia forces. Their homes have been bypassed by enemy forces. Degree of integration is normally low, since their knowledge of ongoing operations is extremely limited. Given this, coupled with their generally poor equipment, targets are normally limited to logistics or command and control facilities.

Tactics and Techniques

See Chapter 13, Partisan Operations.

Chapter 2

Organization for Combat

"The ultimate skill in taking up a strategic position is to have no form. If your position is formless, the most carefully concealed spies will not be able to get a look at it, and the wisest counselors will not be able to lay plans against it."

- Sun Tzu

This chapter defines peacetime organizational structures and provides an overview of how they organize for war, from the Ministry of Defense (MINDEF) to separate brigades. It also provides general data on what is subordinated to MINDEF in times of war or national emergency. Chapter 3, Command and Control, describes the control hierarchy for the organizations covered in this chapter.

MINISTRY OF DEFENSE (MINDEF)

MINDEF is the ministry-level organization responsible for all national defense issues. Its primary responsibilities include providing territorial defense and helping maintain internal security.

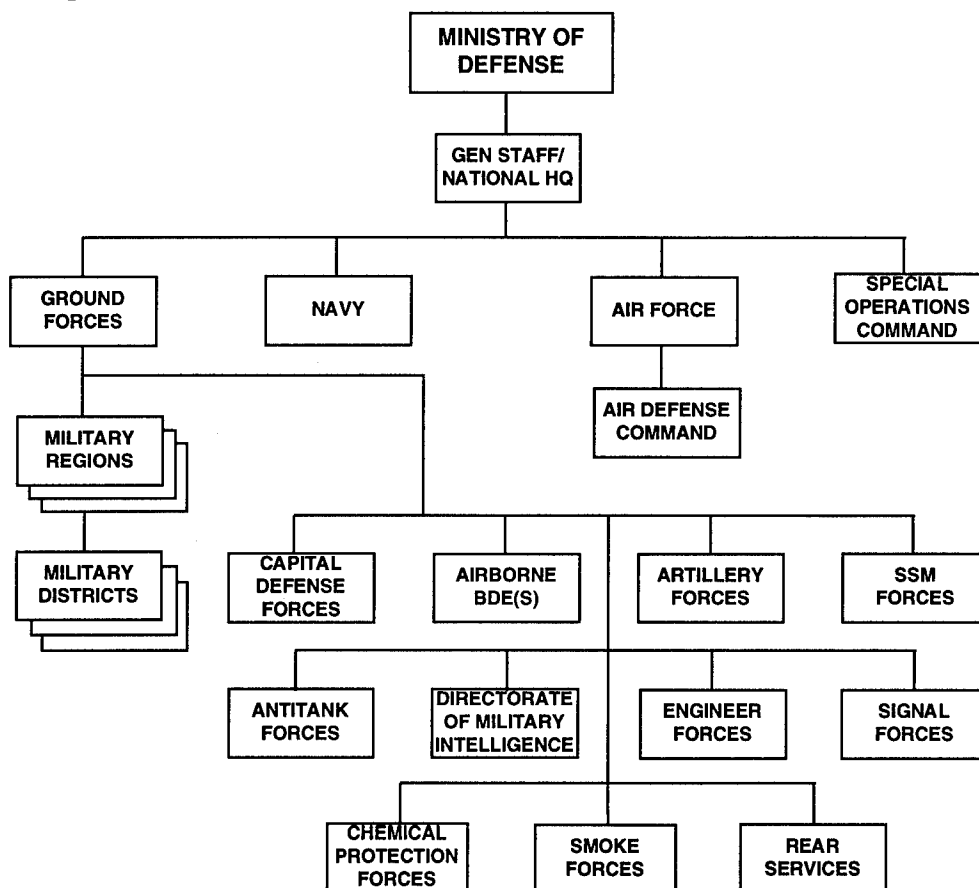


Figure 2-1. Ministry of Defense.

In addition to its own forces, MINDEF has jurisdiction over the Ministry of the Interior (MININT) in times of war or when a national emergency is declared. The MINDEF's primary arm is the General Staff.

GENERAL STAFF/NATIONAL HEADQUARTERS

The General Staff/National Headquarters controls all branches of the armed forces, including the Ground Forces, Navy, Air Force, and Special Operations Command. Since the Ground Forces are the premier branch of the armed forces, and the largest of the four branches, the General Staff is predominantly composed of ground force troops. This allows a direct subordination of military regions, reserve components, and the national pool ground force assets depicted at the bottom of Figure 2-1.

GROUND FORCES

Military Regions

Military regions are geographical entities which delineate the territorial responsibilities and disposition of the country's armed forces. Each region has a number of subordinate military districts. The number varies from region to region, based on political, military, geographical, economic, and demographic considerations. No region has less than two districts. None has more than four. Officially, regions have numerical designations. Some, however, have informal names honoring national or military heroes.

Headquarters

Peacetime. Military region headquarters are administrative entities in peacetime. They are responsible for the training and sustaining of subordinate military districts and the armed forces contained within them.

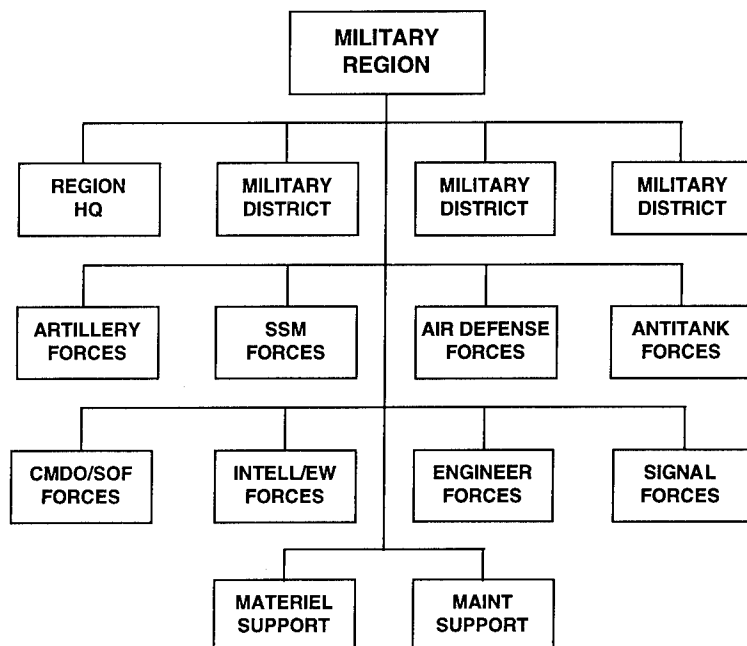


Figure 2-2. Possible military region wartime organizational structure.

Wartime. During wartime, regions are joint commands, and are the integration point for ground, air, naval, and special operations forces. If a region's mission is primarily defensive in nature, the region commander may elect not to form an additional field operating headquarters; he may command from peacetime facilities. Most region commanders elect to form at least one field operating headquarters for better control of subordinate districts and assets allocated to the region. However, if the region's mission is primarily offensive, which would entail the formation of an expeditionary army, the army commander would always establish at least one additional field operating headquarters forward for command and control.

Maneuver Assets

In peacetime, the maneuver assets located within a military region are subordinate to the military districts, whether these are separate brigades, divisions composed of divisional brigades, reserve units, or militia units. For example, a region could have two districts composed of separate brigades, and one district with a standing division composed of divisional brigades.

Combat Support Assets

Figure 2-2 depicts the scope of forces a region could have subordinate to it during wartime. Not all regions would have all types of forces represented. In peacetime, the region may or may not have many combat support organizations, depending on its wartime contingency missions. Most regions have engineer and signal organizations during peacetime. During the transition to war, the General Staff allocates additional assets from the national level, based on the region's mission. For example, a region with the mission to form an expeditionary army

would receive assets first to form army level organizations. Regions with defensive missions would receive assets based on the anticipated threat to that region.

Combat Service Support Assets

Regardless of contingency mission, most regions have materiel support and maintenance support organizations during peacetime. See Chapter 9, Logistics and Rear Area Security.

Military Districts

Military districts are geographical entities which delineate the territorial responsibilities and disposition of forces subordinate to the military region. Officially, districts have numerical designations which show their subordination to the controlling region. However, as with regions, some have informal names honoring national or military heroes. Forces subordinate to the district can vary widely, as shown in Figures 2-3 and 2-4. As a rule, there is no standard template for a district's composition. However, the peacetime composition is a good indicator of probable wartime missions.

Headquarters

Peacetime. Functions mirror those at the region level. Military district headquarters are administrative entities in peacetime, responsible for the routine training and sustaining of the armed forces located in them. This includes reserve and militia units, as well as active duty forces garrisoned within the district. Headquarters size depends on the size and number of subordinate units and the wartime contingency mission.

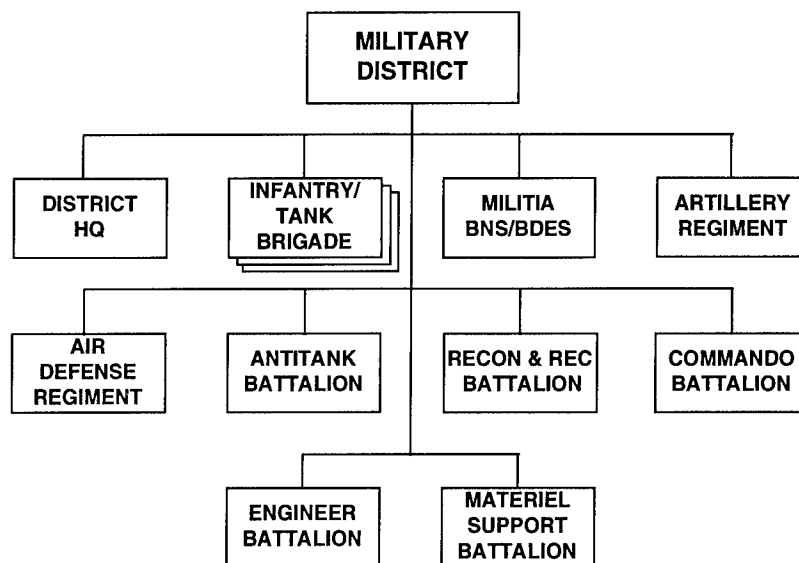


Figure 2-3. Possible "heavy" military district.

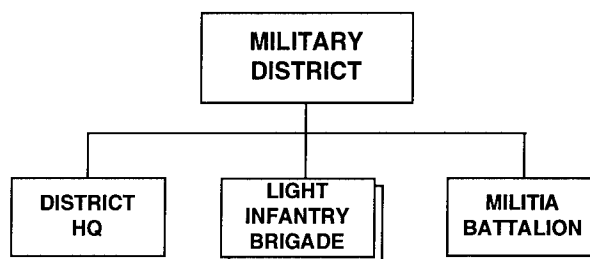


Figure 2-4. Possible "light" military district.

Wartime. If a district's wartime mission is primarily defensive in nature, the district commander may not elect to form an additional tactical field headquarters. As with the region, he can command from facilities already established for that purpose. Most commanders elect to form an additional tactical field headquarters to facilitate command and control of subordinate units, as well as the assets allocated to them by the region. During wartime, the district commander would locate with the forward tactical field headquarters. His deputy district commander would remain at the district headquarters to coordinate the defense of the district with remaining forces, such as separate brigades, reserve units, or militia. He would also coordinate both the further allo-

cation of combat support assets from the region headquarters and the combat service support for the forces acting as part of the expeditionary army.

Maneuver Assets

Districts generally contain one or more separate brigades but may have a standing division. Standing divisions are normally found in districts along an international border, districts which contain historically threatened avenues of approach, or around strategically important cities/facilities. In such cases, the district commander is the division commander. A basically rural, mountainous district with no

major population centers, for example, may have only a single separate light infantry brigade, with little or no additional combat support and combat service support. A district astride a major mounted avenue of approach, or one which contains several major population/industrial centers, may contain several motorized/mechanized brigades. Districts also contain reserve and militia units, both of which are discussed later under those headings.

Combat Support and Combat Service Support Assets

In peacetime, the amount of combat support assets garrisoned within the district depends on its anticipated wartime mission. Many districts have the artillery, air defense, and antitank units depicted in the heavy district example (see Figure 2-3); maneuver force composition determines whether these assets would be towed or self-propelled. Some districts also have the reconnaissance/radioelectronic combat (REC), commando, and materiel support units depicted. Additional support is allocated to the region from the national level during the transition to war. In turn, the region allocates assets to the district. Districts receive combat service support as detailed in Chapter 8, Combat Support Operations.

Expeditionary Army

The OPFOR is capable of fielding a single expeditionary army, composed of mobile divisions, for purposes of conducting large-scale extraterritorial offensive operations. The army is formed for this specific purpose, using a region and its subordinate districts as a base. Ground forces within these districts may be standing divisions, separate brigades, reserve divisions, or a combination.

Headquarters

During wartime, an expeditionary army is a joint command, and is the integration point for ground, air, naval, and special operations forces. It is commanded by the region commander of the region in which it is mobilized. Once the army is formed, he becomes the army commander; the region headquarters becomes the army headquarters. Normally, the army would retain the same numerical designation as the region. For example, forces from the 3d Military Region would be flagged as the 3d Expeditionary Army. The army commander would always establish at least one additional field operating headquarters forward for commanding and controlling subordinate formations and the forces allocated to the army by the General Staff. If the region has an offensive contingency mission, this army headquarters may be formed and partially manned in peacetime. The army commander would probably locate with the forward field operating headquarters. His deputy region commander would remain at the region's peacetime headquarters to direct the efforts of defensive forces remaining in subordinate districts and coordinate the combat service support for the expeditionary army.

Maneuver Assets

The expeditionary army is composed of 3 to 5 mobile divisions, coming from three basic sources: standing divisions, which exist during peacetime; divisions formed using a separate brigade as a mobilization base; and divisions mobilized entirely from the reserves. It may also have separate brigades under army control. Standing divisions may be garrisoned within the military region's subordinate districts, or be

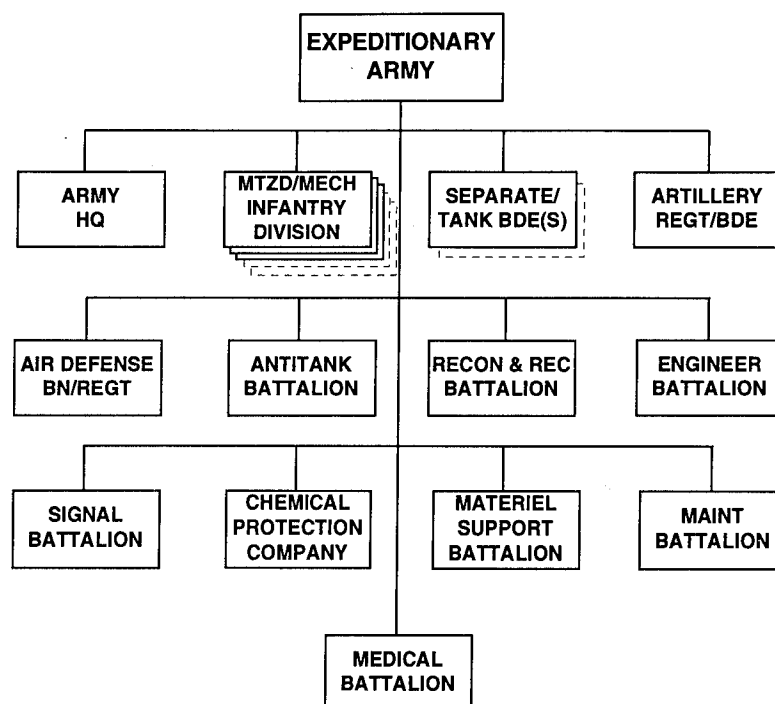


Figure 2-5. Possible expeditionary army organizational structure.

directed from another region by the General Staff. Districts composed of separate brigades may use one of their separate brigades as a mobilization base for a division and constitute the remainder of maneuver forces from the reserves. Units composing a reserve division mobilize from within the region's subordinate districts. The army could include separate brigades directly subordinate to the army commander. These brigades could be pulled from a subordinate district's forces, brought from another region at the direction of the General Staff, or mobilized from the reserves.

Combat Support and Combat Service Support Assets

Expeditionary armies receive assets from the General Staff in the same way a military region does.

Divisions

Regardless of origin, there are three different types of divisions: **light**, **motorized**, and **mechanized** infantry. Figures 2-6, 2-7, and 2-8 highlight the structural differences among the three types. Light and motorized infantry divisions are more common than mechanized infantry divisions. Infantry units within the divisions are divisional light, motorized, or mechanized infantry brigades. Normally, each division has three infantry brigades of the same type.

The OPFOR has two **manning levels** for its units. **Category I** are manned at full strength by active duty soldiers. Except for the militia, all forces discussed in previous sections are Category I units. **Category II** units are composed of active duty cadre, augmented by reservists. The duties in peacetime of the active duty personnel are to form the cadre, conduct training, and main-

tain unit equipment. During periods of mobilization for training or combat, this cadre provides the principal leadership and technical baseline while reservists "fill out the ranks." Unlike militia forces, which are mobilized and controlled at the district and region levels, reserve forces are controlled by a bureaucratic structure which extends from the General Staff down through the military district. In fact, the peacetime administrative duties of region and district headquarters include such functions as registration of draftees, supervising prerecruit and reserve training, assigning reservists to units, and coordinating mobilization efforts. Normally, they fight as part of the district or region in which they register, train, and were mobilized. They can be mobilized to act as part of the expeditionary army, or to defend districts after the departure of the latter's active duty forces.

Headquarters

The district headquarters serves as the division headquarters for standing and reserve divisions. Both are commanded by the district commander.

Maneuver Assets

For standing divisions, subordinate maneuver brigades are garrisoned within the district respective to their wartime mission. Reserve brigades are mobilized from reservists within the district at the direction of the General Staff. The OPFOR reserve system is built upon the maneuver brigade. Therefore, the cadre would be composed of the command and staff elements at brigade level and of brigade subunits, as well as certain technical positions within each of these subunits. All types of brigades previously discussed are represented within the reserves. Reserve separate brigades are intended to fight as part of a district's forces; reserve divisional brigades are intended to fight as part of a division.

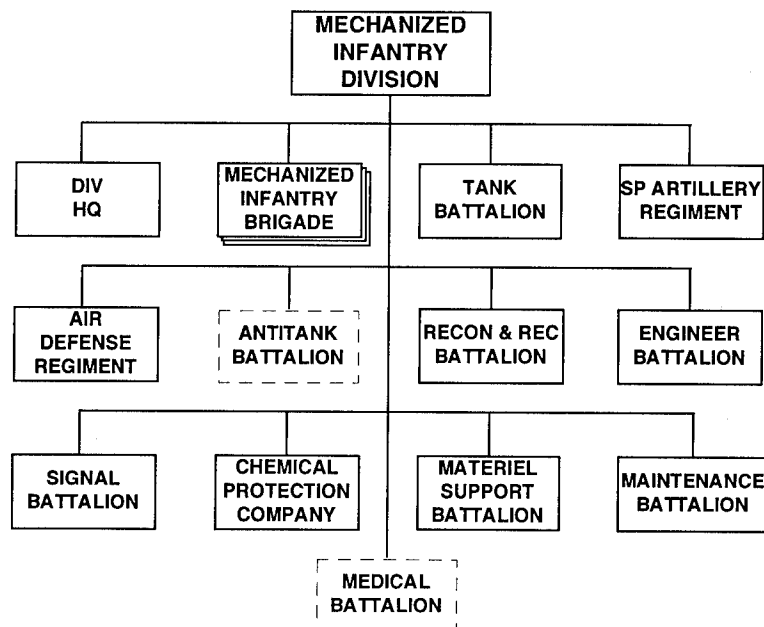


Figure 2-6. Mechanized infantry division.

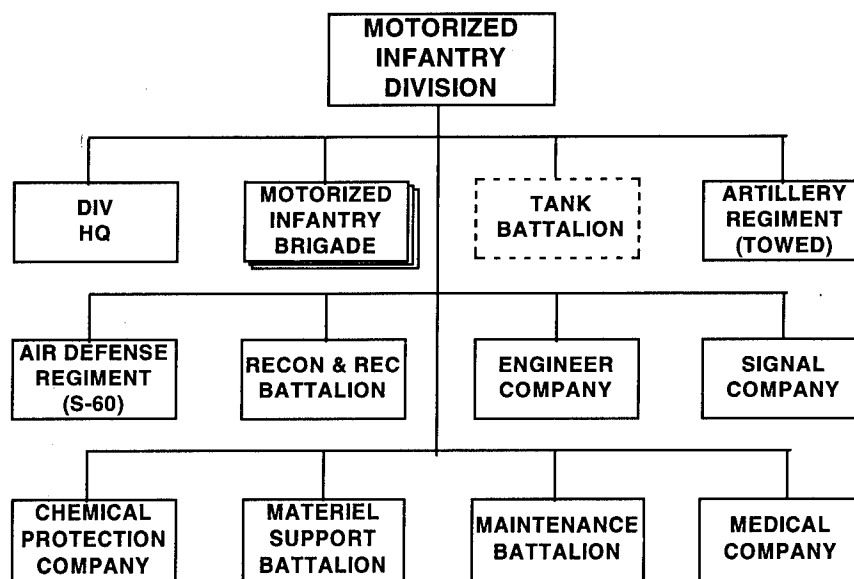


Figure 2-7. Motorized infantry division.

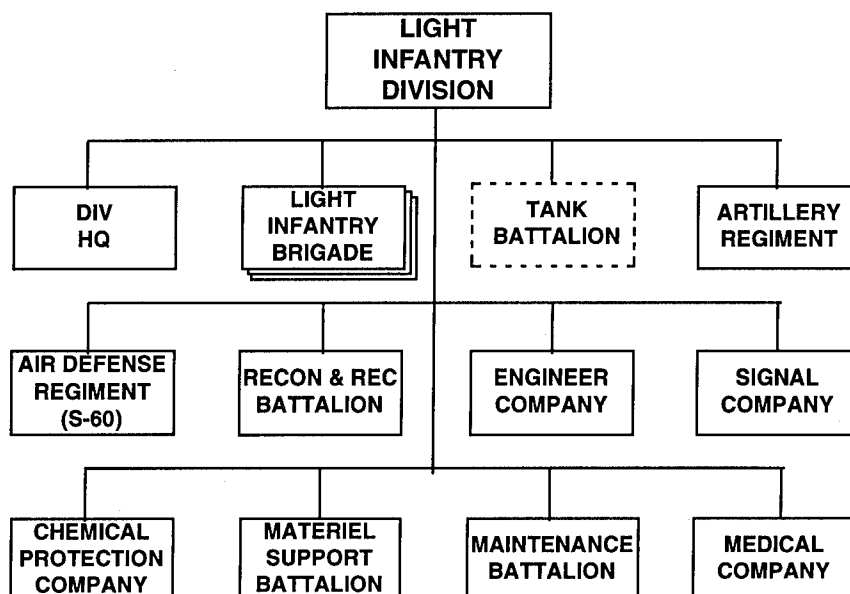


Figure 2-8. Light infantry division.

Combat Support and Combat Service Support Assets

For standing divisions, division-level combat support assets are garrisoned in relation to their wartime mission. Combat

service support assets would be garrisoned near the division headquarters.

For reserve divisions, combat support and combat service support assets for formations above brigade level would come from the General Staff or be mobilized from reserves. Reserve combat support units gen-

erally have older equipment than their active duty counterparts.

Infantry Brigades

There are three types of infantry brigade, whether separate or divisional: **light**, **motorized**, and **mechanized**. Separate infantry brigades, normally organic to the district, are designed to operate independently. They are a more effective, lethal, and versatile organization than the standard divisional brigade. They would never be found subordinate to a division as separate brigades. They may be used as a maneuver base for a district forming a division, but during this structural transition they relinquish the assets which distinguish them from divisional brigades. For example, a separate maneuver brigade has an organic antitank battalion. As the division mobilizes, the district may take this battalion for use as the

division's antitank battalion. Likewise, the robust reconnaissance companies of separate brigades may be broken up to create the reconnaissance and REC battalion normally associated with the division. Normally, they are subordinate to districts. They may be used within the expeditionary army in place of one of the divisions.

Structured to provide their own combat support and combat service support, they are not as dependent on a higher headquarters as divisional brigades. Divisional brigades are always found in a division; they are not structured to operate independently. Figures 2-9 and 2-10, using the light infantry brigade to illustrate, highlight the differences. Complete equipment totals and structural differences are detailed in the *Light OPFOR Organization Guide*.

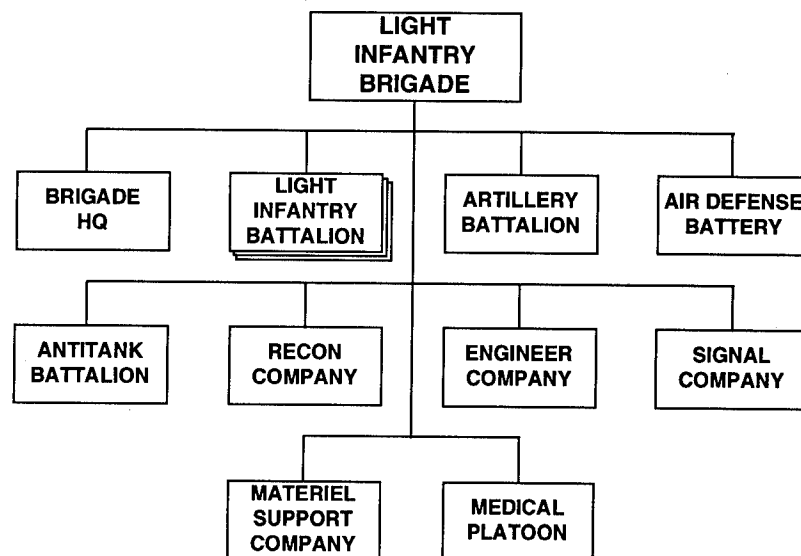


Figure 2-9. Separate light infantry brigade.

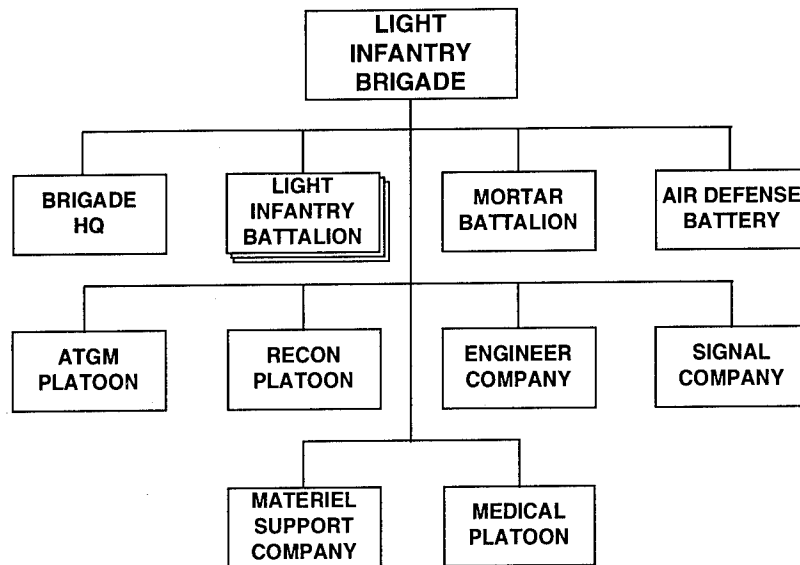


Figure 2-10. Divisional light infantry brigade.

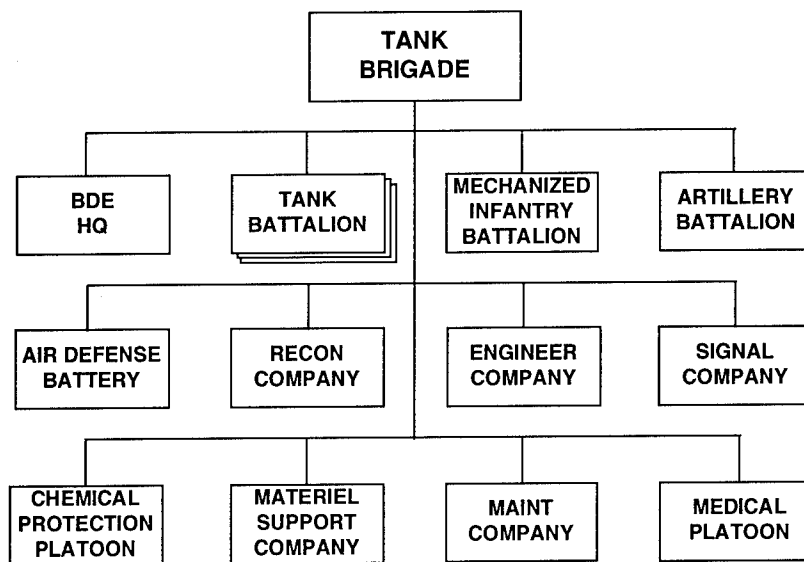


Figure 2-11. Tank brigade.

Tank Brigade

The tank brigade is always subordinate to the district, region or expeditionary army.

Militia

The militia helps fulfill a basic tenet of the People's War, that of linking the entire

population into the defense of the country. In the event of an invasion, militia forces are expected to defend key installations in their towns and cities, among them factories, bridges, roads, and railways. The State government assumes that militia units can perform adequately, due to rudimentary military training, their familiarity with local terrain, and their motivation to protect the local infrastructure. In some instances, they are trained for more complex but very specific

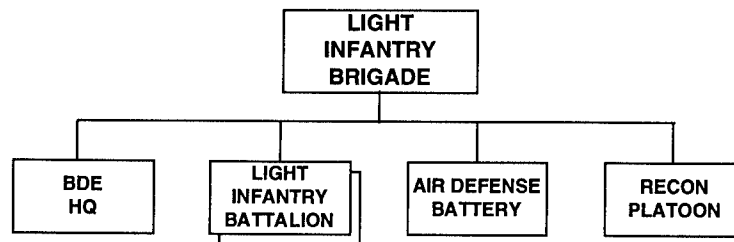


Figure 2-12. Light infantry militia brigade.

missions, such as defending airfields and ports. These forces, quite literally, fight for their farms and homes. Predominantly, militia units are manned by workers and peasants, over-age reservists, medically-retired soldiers, women, and young men not yet old enough for military service. The militia may also be used to reconstitute heavily attrited regular army units and support the regular army through activities such as fortifications and obstacles, communications, and rear services support. Missions also include defending against airborne/heliborne assaults, general logistics and rear area security missions (conducted much in the same way as Civil Defense Forces), and ambushes/raids of enemy command and control facilities, logistic facilities, and lines of communication. While militia units can harass and delay enemy troops, traditional integration into the defensive structure of a regular army unit (i.e., a militia battalion serving as reconstitution for a regular army infantry brigade) would only occur as a last resort. Their ability to engage in integrated offensive operations is questionable, as well, because of their lack of training and poor mobility.

Headquarters

At the district level, the district commander has a militia advisor on his staff, regardless of militia size within the district; this advisor is a regular army officer with prior command experience commensurate with the size militia force contained within

the district. In wartime, he will coordinate mobilization and the actions of the militia.

Maneuver Assets

The largest militia formation is a modification of the separate light infantry brigade. (See Figure 2-12.) Depending on the size of the district's population centers, it may or may not be able to constitute a brigade-sized militia force. Many have only one battalion. Even in more populous districts which can field larger formations, militia may fight at the squad, platoon, and company levels, depending on the amount of time the units have had to prepare and mobilize.

Combat Support and Combat Service Support Assets

A brigade-sized militia force could have one air defense battery and a reconnaissance platoon under brigade control.

National Asset Pool

Centralization of these assets at the national level allows the country to tailor support to subordinate military regions based on specific missions and the perceived threat. Except for the Capital Defense Forces and the airborne brigades, which have narrowly defined missions and methods of employment, the national-level assets depicted below provide a ready pool of

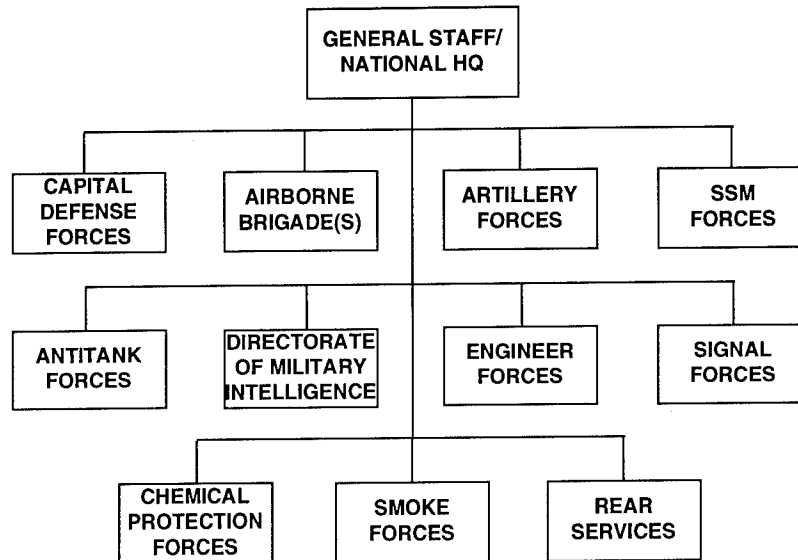


Figure 2-13. Asset pool subordinate to the General Staff.

forces. This enables **one region** to form an expeditionary army capable of conducting large-scale offensive operations, and the remaining regions to conduct defensive operations. Regions are the primary recipients of these assets; they may remain under region control to create region- or army-level support organizations. They may be further allocated to subordinate military districts to form district- or division-level support organizations; this depends on mission and the forces already garrisoned there.

Capital Defense Forces

These forces, garrisoned in the Capital District, are the best-equipped in the country. Their primary mission is to defend the country's capital, with a secondary mission as the strategic reserve. Composition has changed several times since inception, between a standing division and a division-sized element composed of separate brigades. Currently, these forces are configured with separate brigades as a base. Also included are artillery, engineer, air defense, and service support assets.

Airborne Brigade(s)

The country's airborne brigade(s) is held as a strategic asset. Although it may be employed in support of an operation conducted by military regions or an expeditionary army, the brigade is never allocated to them in the same manner as other forces. See Chapter 11, Airborne and Air Assault Operations.

Artillery Forces

These forces are made up of a wide variety of tube artillery and multiple rocket launcher organizations, ranging from single battalions to regiments and brigades. Based on wartime mission, the General Staff allocates these forces to regions/armies for the formation of artillery groups at region/army and district/division. See Chapter 6, Fire Support.

Surface-to-Surface Missile (SSM) Forces

These brigades, although sometimes fielded as individual battalions, are considered a strategic asset. They may be allocated to military regions, but would remain under the control of the General Staff. See Chapter 6, Fire Support.

Antitank Forces

These battalions, composed of ATGM batteries, gun batteries, or a combination of the two, are always allocated to military regions. Military regions may use them as a region/army level asset, or allocate them to subordinate districts. See Chapter 6, Fire Support.

Directorate of Military Intelligence

This directorate is composed of an operations battalion, radio reconnaissance battalions, and reconnaissance and radioelectronic combat (REC) battalions. The operations battalion remains under national control, but would allocate counterintelligence and interrogation assets to subordinate military regions. Radio reconnaissance battalions are normally retained under the control of the General Staff, but may be allocated to the regions. Reconnaissance and REC battalions are identical to those organic to some districts and standing divisions. These battalions would be allocated to regions and armies during wartime. See Chapter 8, Combat Support Operations.

Engineer Forces

Except for a few specialized pontoon bridge and assault crossing organizations, these forces are predominantly combat engi-

neers. These brigades are engaged in both peacetime and wartime missions. Most military regions and districts have organic combat engineer organizations (either company or battalion strength). However, a region forming an expeditionary army may be allocated additional combat engineer resources, as well as the specialized battalions. See Chapter 8, Combat Support Operations.

Signal Forces

Regions normally have signal organizations during peacetime; as do standing divisions. During wartime, military regions without signal organizations are normally allocated a signal battalion. Military districts normally receive a signal company.

Chemical Protection Forces

Only standing divisions have organic chemical protection organizations above brigade level. During wartime, military regions are normally allocated a chemical protection company/battalion. Military districts normally receive a company. See Chapter 8, Combat Support Operations.

Smoke Forces

An expeditionary army receives the majority of the scarce smoke assets. In defensive operations, a military region could receive a smoke battalion and further allocate individual companies to subordinate districts. See Chapter 8, Combat Support Operations.

Combat Service Support

Most regions, all standing divisions and separate brigades, and a few military districts have combat service support or-

ganizations during peacetime. See Chapter 8, Combat Support Operations.

NAVY

The OPFOR Navy is the smallest of the armed forces. Within the geographical region, however, it is the only significant naval force, and is easily the best-equipped and trained. It is capable of repelling an invasion attempt by any one of its neighbors. However, it could not defend against a large-scale amphibious invasion by a major power.

Equipment

The OPFOR Navy is composed of coastal defense forces: missile attack boat squadrons, patrol torpedo boat squadrons, amphibious support boat squadrons, and coastal defense squadrons. These squadrons are organized into fleets, which are composed of two or more squadron types, along with service support vessels. Squadrons/fleets are normally regionally-affiliated. Current plans for expansion of the naval forces include acquisition of frigates, submarines, submarine chasers, and minesweepers, all of which would be organized into squadrons, and regionally-affiliated. Once acquired, these assets would give the naval forces a more credible blue-water capability.

Missions

- Naval missions include--
- Defending the coast against invasion by sea.
- Providing fishing and merchant marine ships with escort protection.
- Surveillance of territorial waters.
- Amphibious support to special operations.

- Preventing infiltration and exfiltration by sea.

How the Navy conducts these missions is detailed in Chapter 12, Naval Operations and Amphibious Landings.

AIR FORCE AND AIR DEFENSE COMMAND

The OPFOR Air Force and Air Defense Command is second only to the Ground Forces in size. Within the geographic region, it is the largest air/air defense force, and is the best-equipped and -trained. Its inventory of fixed-wing and rotary-wing aircraft far exceeds that of its neighbors, allowing for regional air superiority, and its air defense elements provide the OPFOR with a formidable series of point defenses against any regional air attack.

Organization

Air Force

The Air Force fixed-wing assets are organized into regiments, and generally fall into one of three regimental types: **fighter-bomber**, **fighter-interceptor**, and **transport**. Rotary-wing assets are also organized into regiments, and are either attack/general-purpose or transport.

Air Defense

The Air Defense Command contains both surface-to-air missile (SAM) regiments/brigades and antiaircraft artillery (AAA) regiments, the latter composed of older, but not obsolete, systems. The range of systems and regimental/brigade types are detailed in the *Light OPFOR Organization Guide*. Maintaining single system units allows the Air Defense Command to manage

limited assets, tailoring specific support to the air defense zone. Air defense zones may or may not coincide with the regional or district boundaries of ground forces.

Missions

Generally, the Air Force and the Air Defense Command are responsible for defending the country from aerial attack and for providing tactical air and airlift support to ground, naval, and special operations forces. How the Air Force and Air Defense Command conduct these missions is detailed in Chapter 7, Air and Air Defense Operations.

SPECIAL OPERATIONS COMMAND

The Special Operations Command is composed of special operations brigades and commando battalions. Both type of forces have organic combat support and combat service support assets. Special support requirements, such as airborne/heliborne insertion or amphibious landing, are coordinated through the Air force or Navy. A complete discussion of the Special Operations Command and its missions is in Chapter 10, Special Operations.

MINISTRY OF THE INTERIOR (MININT)

During peacetime, the MININT is responsible for internal security and all related functions. During wartime or when a national emergency is declared, the MININT is subordinated to the MINDEF. The MININT has several deputy ministers, each of whom heads a functional directorate and units charged with implementing policies. Activities are organized by region and are supervised by staff elements in the regions. Elements of the Ministry include Civil Defense Forces, the Directorate of State Security, the Directorate of General Police.

Civil Defense Forces

Civil Defense Forces are composed of a variety of non-military units. The collective mission of these forces is to protect the population and economic centers against all types of natural disasters and warfare. Areas of responsibility are divided into defense zones, which correspond to region and/or district boundaries. In peacetime, normal missions include emergency engineering, recovery and rescue, and other disaster relief functions. During wartime, rear area security is the primary mission. Units have no standard structure and are grouped according to function. Functions range from repair and salvage, fighting fires, to rendering first aid.

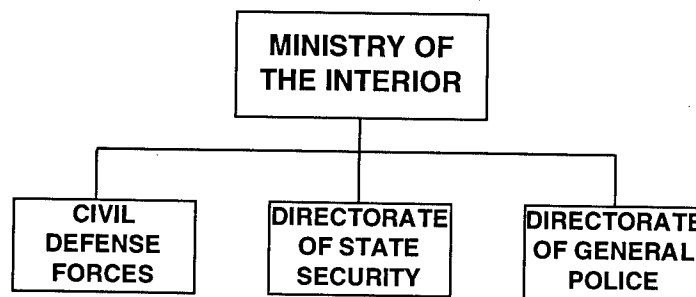


Figure 2-14. Ministry of the Interior.

Directorate of State Security

The Directorate of State Security is responsible for preventing counterrevolutionary activities, investigating these activities, and prosecuting the perpetrators. During times of crisis and/or war, the Directorate is responsible for finding and neutralizing dissidents and spies. Elements of the Directorate are deployed throughout the country, normally collocated with region/district headquarters.

Directorate of General Police

The Directorate's responsibilities include management of the national and local police force, fire protection, and the oversight of the penal system.

Chapter 3

Command and Control

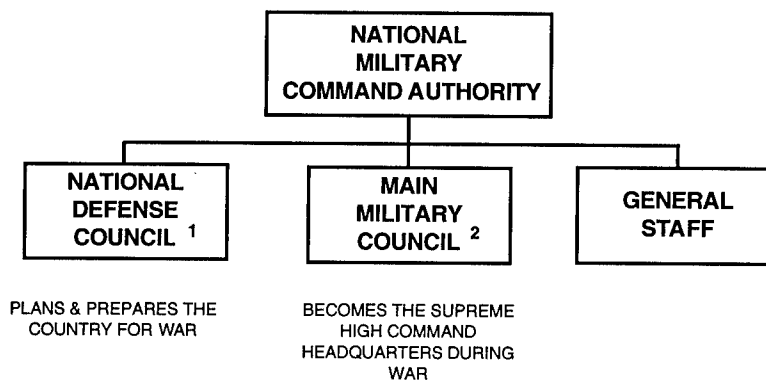
NATIONAL MILITARY COMMAND AUTHORITY

The National Military Command Authority exercises complete control over all military planning and activities of the OPFOR. It is composed of three major bodies: the National Defense Council, the Main Military Council, and the General Staff. (See Figure 3-1.)

National Defense Council

The ministry-level National Defense Council is responsible for planning and preparing the country for war. It is chaired by the President of the State Government. The Minister of Defense, Minister of the Interior, and Minister for Foreign Affairs are the primary members. Other members include Defense Counselors selected by the President.

Traditionally, these are retired general officers from the different branches of the armed forces. This council is the OPFOR's highest military-economic planning agency. It considers issues focusing on the nation's defenses, economic plans, and government branches. These include the mobilization of industry, transportation, and personnel for war, and the peacetime structure of the armed forces. Its deliberation and decrees are translated into law. Once war is declared, two people from this council become commanders. The President becomes the Supreme High Commander of Forces; the Minister of Defense, who is always the most senior ground force general officer, becomes the Commander of the Armed Forces. In wartime, this entire body essentially becomes a war cabinet with oversight of the political,



FOOTNOTES:

1. Chaired by the President of the State government. The President becomes the Supreme High Commander of Forces.

2. Chaired by the Minister of Defense. In war, the Minister of Defense becomes the Commander of the Armed Forces. The Main Military Council becomes the Supreme High Command Headquarters.

Figure 3-1. National Military Command Authority.

diplomatic, and economic aspects of the nation at war, as well as general policy matters concerned with the conduct of military operations. Beginning at this level, one major resubordination occurs once war is declared. The Ministry of the Interior becomes subordinate to the Ministry of Defense (MINDEF). In essence, this consolidates wartime responsibilities for internal security under the military.

Main Military Council

The Main Military Council is responsible to the National Defense Council for the overall leadership and status of the armed forces in peacetime. It is almost solely composed of MINDEF personnel. The Minister of Defense heads this council. The Chairman of the National Defense Council is represented by one of his deputies. The First Deputy Ministers of Defense are also members; one of the First Deputy Ministers is the Chairman of the General Staff. Deputy Ministers on the council include region commanders, who constitute the commanders of the ground forces, and the commanders of the other three military services. In wartime, the council becomes the Supreme High Command Headquarters, which would represent the top echelon of OPFOR wartime military control. The Minister of Defense becomes the Commander of the Armed Forces. The Supreme High Command plans and directs strategic operations, sizing and allocating forces to implement its plans. Force composition, missions, and the general plans for the conduct of operations are established by this body.

General Staff

The General Staff is the major link in the centralization of the National Military Command Authority. It is the executive agency for the Main Military Council in peacetime and the Supreme High Command in wartime. The General Staff is charged with the basic military planning for the armed forces, both in peace and war. General Staff composition includes a variety of directorates. Like the Main Military Council, it is composed of MINDEF personnel. The three primary directorates are operations, intelligence, and organization and mobilization. As the central military staff organ, it coordinates the activities of the ground forces (military regions and subordinate districts) and the other branches of the armed forces. In peacetime, it translates national policy decisions into war plans and orders. In the transition to war, it allocates the combat support and combat service support assets required for ground forces to execute their missions. In wartime, it directly controls the forces contained within the Capital Defense Forces, which may serve as the strategic reserve. Based on guidance from the Supreme High Command, it is also responsible for mobilization of reserve forces. The ground forces and other branches of the armed forces report to the Minister of Defense through the General Staff in peacetime. In wartime, field forces report to the Supreme High Commander of Forces and the Supreme High Command through the General Staff.

THEATER OF MILITARY OPERATIONS

The area of land and sea (and the air space above) on which the armed forces prepare for war, deploy military forces, and conduct war at the strategic level make up

the **theater of military operations**. The theater of military operations always encompasses the State in its entirety, and may include a considerable portion of countries adjacent to the State. The basic types of strategic ground operations are the **offensive, defensive, and counteroffensive**.

The **strategic offensive** is considered the most decisive form of strategic operation. A strategic offensive is conducted over a single strategic axis. Primarily, it is conducted with a single expeditionary army, supported by air, naval, and special operations forces. It may also be supported by limited-objective attacks from the forces of other regions. These are joint operations, conceived by the Supreme High Command, planned and conducted by the General Staff for the Supreme High Commander of Forces. The sizings of the expeditionary army, the allocation of other forces, the assignment of missions, and the concepts of operations are responsibilities of the General Staff.

The **strategic defensive** encompasses the entire State and occurs as a result of an invasion. This is an invasion by a larger, more powerful extra-regional force. The defense is conducted by the military regions and their subordinate districts, to include active duty ground forces, reserves, and militia. It is supported by air, naval, and special operations forces, depending on the availability of these assets. The OPFOR views the requirement for the strategic defensive as a probable outgrowth from a response to a strategic offensive. How much support is available for defending forces depends on the requirements of the expeditionary army. The allocation of other forces, the assignment of missions, and the concepts of operations are responsibilities of the General Staff.

The **strategic counteroffensive** entails commitment of the Capital Defense Forces, which serve as a strategic reserve. This would normally occur in the later stages of the strategic defensive, to complete the defeat of invading forces. The sizing of the basic force, the allocation of other forces, the assignment of missions, and the concepts of operations are responsibilities of the General Staff.

COMMAND AND CONTROL SYSTEM

The following paragraphs cover general organs of command and control common at all echelons of the ground forces. Although the focus is on the ground forces, the tenets and principles are applicable to all branches of the armed forces.

Commanders

The OPFOR recognizes that effective command and control are critical for success in modern combined arms warfare. The commander at each level is charged with overall responsibility for his forces. OPFOR doctrine emphasizes that under the fluid conditions of modern warfare, even in the course of carefully planned operations, the commander must accomplish assigned missions on his own initiative without constant guidance from above. To do this, the commander must be well informed about the general situation and the intentions of the senior commander.

Organization of Headquarters

All headquarters (military regions, expeditionary army, military district, and divisions) are organized to perform some of the same basic functions, but differ in size and complexity. The higher the level, the larger and more complex the staff tends to be. The largest functional difference between region and district level staffs is that regions are joint commands, and therefore have staff elements to support the integration of other branches of the armed forces.

The staff, supervised by the chief of staff, assists the commander by planning, monitoring, and controlling operations. The principal functions of a OPFOR staff are: intelligence, operations, aviation, artillery, air defense, engineer support, chemical defense, communications, and logistics and rear area defense.

To perform the different principle functions, there are staff elements representing intelligence and reconnaissance, artillery, aviation, air defense, engineer, chemical protection, logistics, and communications. Special operations and naval elements may be present. Each is responsible for the technical aspects of its functional area. The senior officer of each arm is also an advisor with direct access to the commander.

The logistics staff is responsible for coordinating rear service activities and for liaison between other staff elements and logistics organizations. Logistics activities are managed by the deputy commander for the rear.

Command Posts

Control is exercised through a series of command posts (CPs). Level of command determines the number and type of CPs. There are four basic types of CPs: **main**, **alternate**, and **rear CPs**, and **command observation post**.

The commander decides where the posts locate and how they move. Region- and district-level CPs generally are deployed in depth to facilitate control of their entire areas of operation.

During lengthy moves, CPs may leapfrog forward along parallel routes. They are preceded by reconnaissance parties (including chemical and engineer reconnaissance elements) that select the new locations and act as traffic regulators. While on the move, CPs maintain continuous contact with subordinate units, higher headquarters, and flanking units. Normally, the alternate and main CPs move by leapfrogging each other, one moving while the other is set up and controlling operations.

During movement halts, CPs are dispersed in concealed areas and are camouflaged if necessary. Radio stations and special vehicles are located some distance from the actual command center.

All headquarters have an administrative element that provides local security and traffic control. Air defense of these headquarters receives a high priority. Due to dispersion in a mobile environment, CPs are often responsible for their own local ground defenses.

Main Command Post

A **main CP** is the primary CP at brigade, division, district, expeditionary army, region, and higher. Brigades, divisions, and expeditionary armies always establish this CP as a mobile field headquarters. For most divisions and an expeditionary army, this is essential due to their offensive missions. As detailed in the previous chapter, military regions and districts conducting a defense within their territorial borders may elect to use their peacetime headquarters facilities as the main CP. At both echelons, however, the tendency is to establish the main CP as a mobile field headquarters. The main CP is augmented by an alternate CP at division and above.

Alternate Command Post

An **alternate CP**, with reduced staffing, is established to ensure continuity of control during movement of the main CP or should the main CP be put out of action.

Rear Command Post

A **rear CP** is established to control logistics and rear service assets. From it, rear service support is organized and directed. Brigades, divisions, and expeditionary armies always establish this CP as a mobile field headquarters. As detailed in the previous chapter, military regions and districts normally establish the main CP as a mobile field headquarters; their peacetime headquarters facilities are then used as the rear CP, controlled by the deputy commander for the rear.

Command Observation Post

A **command observation post** is established by the commander. Normally, it is an armored command vehicle, an APC, or tank. It is the only CP formed below battalion level.

Communications

The OPFOR recognizes that it cannot effectively control the battlefield actions of combined arms formations without good communications. It realizes that enemy forces will continually strive to disrupt its communications. To counter this threat, the OPFOR stresses redundancy in communications modes and equipment. Much of this redundancy entails using means outside the realm of traditional military communications methods, such as the national phone system and cellular phones.

Principles

The following general principles apply to military communications:

- Security is a prime consideration for selecting the means of communications.
- The responsibility for maintaining communications is from higher to lower. If the higher unit cannot establish communications, the responsibility moves to the subordinate unit. Lateral communications are established from right to left.
- Wire is the primary means of communications for defensive military operations. Wire encompasses the military landline and the national telephone service as a single system. Radios are the backup and are only

Unit/Type	Main	Alternate	Rear	Observation
Region/Army	√	√	√	√
District/Division	√	√	√	√
Brigade	√		√	√
Battalion				√
Company				√
Platoon				√

Figure 3-2. CPs.

used as the primary means when the landline system fails. Couriers can augment either wire or radio.

- Command nets are designed to provide "skip echelon" communications with subordinates two levels down. This communications structure allows, for example, a district or division to control a battalion, or a brigade to control a company, if necessary.
- The organization of communications to meet immediate tactical requirements is a responsibility of the commander at each tactical level.

Equipment

OPFOR traditional field communications equipment range from simple, easy-to-operate electronic devices to complex, vehicle-mounted equipment that requires highly skilled operators. OPFOR ground force radios include low-power, frequency modulated (FM) and amplitude modulated (AM) sets of manpack and vehicle-mounted types, medium-power high frequency (HF) radio stations of a heavy mobile variety, and multi-channel radio-relay equipment.

Communications at military region and above include the national phone system, landline, microwave relay, and cellular phones. Dedicated hardened lines exist be-

tween fixed radar sites and control centers to support data transmission for the air defense system. Although limited in availability, secure phones are used by major headquarters.

The military district may use the national phone system to communicate with higher commands, and use radios for tactical formations. In the defense, tactical formations at military district and below may also use military landline tied into the national phone system as a means of communication. International telecommunications are via leased satellite trunk through a fixed earth station in the capital. Portable satellite communications ground stations may be available.

To communicate with overseas agents, advisors, and revolutionary cadres, the OPFOR has devised a system of overt and covert communications. The system includes some special, long-range HF radio systems, embassy communications, international postal systems, couriers, satellite telephonic communications and very old short-wave systems. Each subsystem can be used overtly or covertly and has a wartime application.

Communications Nets

The following types of communication nets are used:

Command nets are used by the commander primarily to pass combat orders. Channels generally are direct from a superior to his immediate subordinates, but they also permit skipping echelons.

Staff nets are used by the chief of staff for directing other staff elements at his level and for keeping subordinate and superior staffs informed of his commander's intentions. The chief of artillery at military region, army, district and division has his own staff communications for control of units subordinate to him and to direct the actions of similar forces at the next lower level. The chiefs of engineer and chemical protection use the main staff communications network.

Air defense nets include air surveillance nets to radar sites, air warning nets, and air defense control nets connecting higher and lower staffs and air defense units.

Rear services nets are used by rear elements to control supply, transport, medical, and other support services at all levels down to battalion. More reliance is placed on landline, cable, and wire for these nets than for the other types.

Liaison nets are established between ground force units operating in coordinated action, and from supporting units to supported units. Each liaison officer provides his own communications equipment to operate with his parent unit.

Communications units are either allocated or assigned at all levels from mili-

tary region to brigade to support internal headquarters and to provide communications with higher, subordinate, and adjacent units. At the tactical level, each military district receives support from its parent region during wartime. Each mechanized infantry division has a signal battalion; motorized and light infantry divisions have either a signal battalion or company. Each separate or divisional brigade has a signal company to support itself and its subordinate units. Only mechanized infantry units have organic signal troops at battalion level.

GROUND FORCE COMMAND AND CONTROL: REGIONS AND DISTRICTS

Region- and district-level command and control methods and mechanisms are very similar. As previously mentioned, they differ in size and complexity. Since they are so similar, the common concepts are addressed here collectively. In instances where a difference between echelons is significant, the distinction is made. Region-level refers to military regions and expeditionary armies; district-level refers to military districts and divisions.

There are two fundamental areas of region- and division-level command and control: the command group and the staff. The command group includes the commander and those officers working for the commander in a direct command relationship those who cause the unit to execute his orders. The staff includes officers assisting the commander in planning and supervision. Some officers fall into both categories.

Command Group

The commander commands through a group of deputy and subordinate commanders. He exercises command authority over his unit and is responsible for its actions. His deputies are responsible for some of the technical or branch-specific operations. Subordinate maneuver unit commanders are considered major subordinate commanders. The deputy commanders are the chief of staff, the deputy commander for the rear, and the chief of artillery.

The **commander** is responsible for the combat readiness of the unit. He is responsible for combat training, military discipline, condition of the unit's equipment, and all logistic and medical support. He is responsible for all troop control measures during the preparation, organization, and conduct of combat.

The **chief of staff** is the assistant to the commander. The chief of staff is the only officer authorized to issue orders in the name of the commander. It is his responsi-

bility to understand not only the commander's specific instructions, but his command methodology. He ensures the execution of the commander's orders during the commander's absence. The commander may be located well forward at a small mobile CP during combat. In these circumstances, the main CP is under the control of the chief of staff.

The **deputy commander for the rear**, normally the region or district deputy commander, is responsible for the combat service support of the unit. This combat service support includes supply, transportation, maintenance, and medical support. The deputy commander for the rear develops plans and orders, is supported by a rear staff, and operates a rear CP. Depending on the mission, he may also be responsible for coordinating additional support assets allocated from the General Staff, as well as coordinating reserve activation and militia utilization. He can be considered the "installation

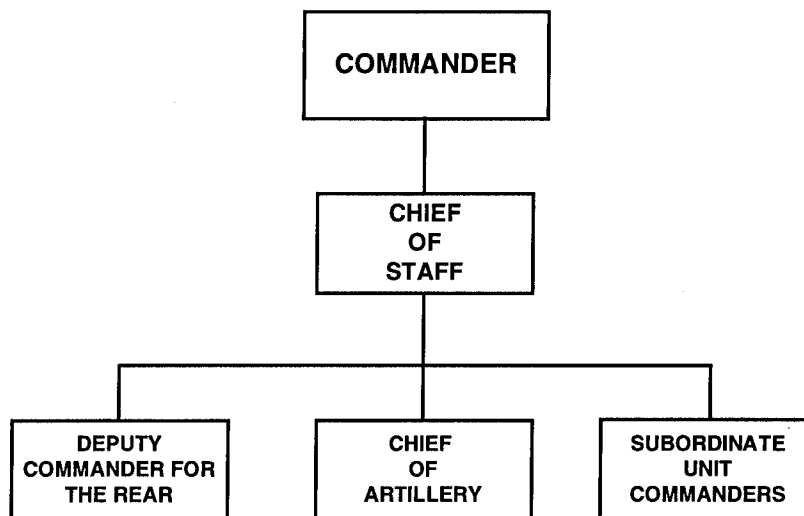


Figure 3-3. Command group.

commander" for the rear area. He is responsible for rear area organization and security and assigns locations in the rear area. Additionally, he establishes policies and plans concerning security and damage control. He is responsible for direct support maintenance for both armored and wheeled vehicles, procurement of repair parts, and vehicle replacement. He also oversees maintenance training. During combat, he directs the repair and evacuation of disabled equipment, and informs the commander on the status of the equipment.

The **chief of artillery** coordinates and plans the artillery fires of the organic and attached units. The commander issues orders concerning artillery support to the chief of artillery. During the course of the battle, however, he serves primarily as a special staff officer, advising the commander on artillery matters.

Subordinate unit commanders are responsible for the combat readiness of their units, as well as combat training. They are the instruments through which the region or district commanders fight the battle.

Staff

The **chief of staff** controls the staff and coordinates its work. He is the primary conduit for information between the commander and his unit. He reports staff findings and acts as the organizer for execution of the command decision. He is responsible for coordination of all staff work, and is personally responsible for the coordination of logistics requirements between the branch chiefs and the deputy commander for the rear.

Coordinating Staff Sections

Four sections make up the coordinating staff. Each section is controlled directly by the chief of staff. The four sections are: **operations, intelligence, personnel, and communications.**

The most important coordinating staff section is the **operations section**, headed by the chief of operations. The chief of operations has responsibility for training and formulating operations plans and orders. He monitors the work of all other staff sections, keeps abreast of the situation, and is ready to present information and recommendations concerning the ongoing operational or tactical situation. In coordination with the intelligence section, the chief of the operations section keeps the commander informed on the progress of operations. His specific duties include:

- Collecting information concerning the tactical situation of friendly forces to include his unit, adjacent units, and higher units.
- Preparing and disseminating orders, operations plans and reports.
- Providing liaison for the exchange of information within the unit headquarters and with higher, subordinate, and adjacent units.
- Organizing the main CP.
- Organizing troop movement and traffic control.
- Coordinating the organization of reconnaissance with the intelligence section.
- Coordinating combat support.

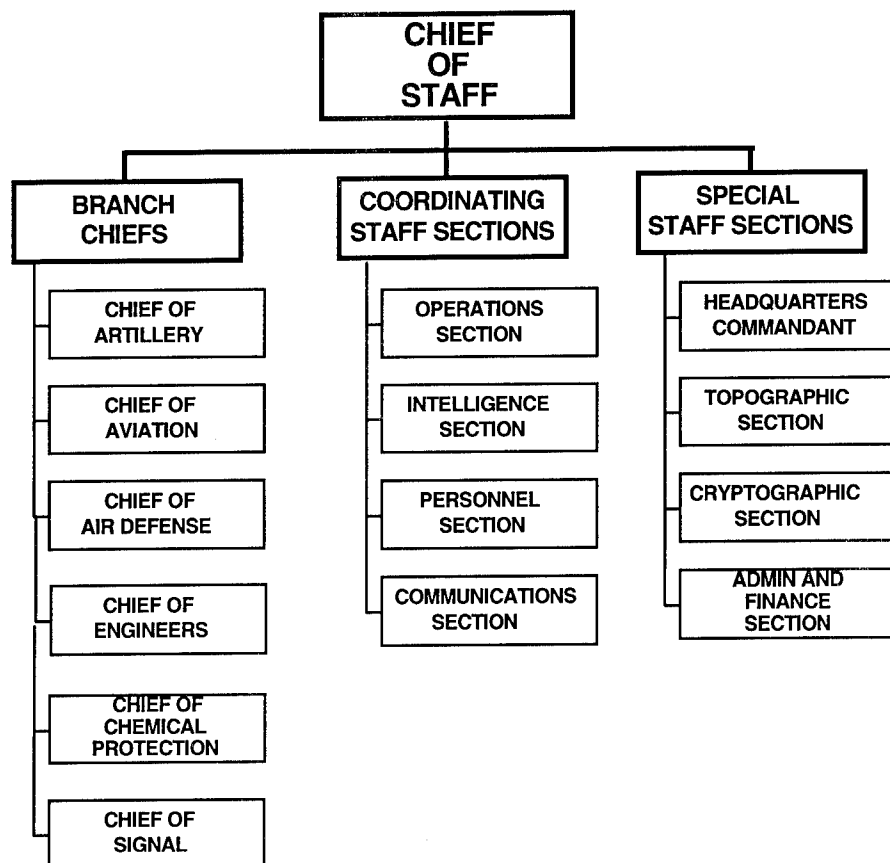


Figure 3-4. Staff.

The **intelligence section** is headed by the chief of intelligence. The chief of intelligence also serves as the chief of reconnaissance. He is part of an intelligence chain that originates at the national level. His intelligence efforts fit into an overall intelligence plan.

The chief of intelligence is subordinate to the chief of staff, but can report directly to the commander. In coordination with the operations section, the intelligence section makes collection plans, and collects and evaluates information concerning the enemy, weather, and terrain. The section disseminates evaluated timely information. During combat, the chief of intelligence directs the efforts of subordinate intelligence

sections and reconnaissance units. His specific responsibilities include:

- Collecting and analyzing information on the enemy, terrain, and weather.
- Disseminating of analyzed information to the commander and adjacent units.
- Developing requirements-based collection plans.
- Organizing reconnaissance missions, to include requests for aerial reconnaissance.
- Preparing the intelligence portion of combat orders.
- Preparing periodic intelligence reports and briefings.
- Exploiting documents and materiel.
- Interrogating prisoners of war.

The **communications section** is headed by the chief of communications. The chief of communications is also the chief of signal troops. He organizes communications with subordinate, adjacent, and higher headquarters. The communications section must ensure that the commander has continuous and uninterrupted communications by planning wire, radio, and mobile communications. The term "mobile communications" includes all means of communications other than radio and wire. Specific responsibilities of the communications section include:

- Organizing the communications network, to include all integrating all primary methods to be used by the headquarters (i.e., linking military communications with the national phone system).
- Establishing callsigns and radio procedures.
- Organizing courier services.
- Supervising the supply, issue, and maintenance of signal equipment.

The **personnel section** is headed by the chief of personnel. He assigns personnel; requests replacements, records losses, administers awards and decorations; and collects, records, and disposes of war booty. This is the one staff officer who may not physically locate with the rest of the staff. Although he reports directly to the chief of staff, he often locates with the deputy commander for the rear.

Coordinating staff responsibility for logistics rests with the chief of staff. He cannot devote a large portion of his time to detailed logistic coordination and still fulfill his other duties. This increases the burden on the branch chiefs and the deputy commander for the rear. Each chief is responsible for consolidating and forwarding logistic

requests for his branch to the deputy commander for the rear.

Special Staff

Special staff includes special staff sections, as well as the branch chiefs.

Special staff sections. This staff includes the following four special staff sections. They are listed in order of probability. Most region- and district-level staffs have a headquarters commandant. Some region-level staffs have a topographic and cryptographic section. Administration and finance sections are rare at either echelon.

- The **headquarters commandant** is responsible for insuring that the headquarters and CPs are properly located, organized, supported, and protected.
- The **topographic section** gathers and analyzes terrain data and maintains supplies of maps, catalogs, and map-related equipment.
- The **cryptographic section** encodes and decodes the unit's cryptographic communications, designates the codes to be used in communicating with subordinate units, and supervises communications security procedures and cryptographic training. This section's activities are integrated into a larger effort, coordinated by the chief of the intelligence section.
- The **administration and finance section** organizes the administration and records necessary for providing quarters, food, supplies, and pay for personnel.

Branch chiefs. The branch chiefs serve as special staff officers. They also

advise the commander on matters pertaining to their specific fields.

- The **chief of artillery** serves as unit fire support coordinator. As the chief artillery advisor in combat, he usually locates with the unit commander. He may have naval liaison elements as part of his staff.
- The **chief of aviation** advises the commander on the capabilities and uses of air assets, manages requests for all types air support, and maintains communications with air assets operating in the battle area. Size of his support element depends upon the mission.
- The **chief of air defense** acts as a special staff officer for air defense employment.
- The **chief of engineers** advises the commander on engineer support for all missions. He assigns tasks to engineer units based on the commander's concept of the operation.
- The **chief of chemical protection** is responsible for the unit's protection from NBC weapons. He is responsible for the supply and maintenance of NBC gear and equipment, for organization of NBC reconnaissance, and for all NBC training and work performed by unit personnel.
- The **chief of signal** is also the chief of the communications section.
- The **chief of reconnaissance** is also the chief of the intelligence section.

Depending on the mission, other branch chiefs may be required. An example of this would be a liaison function with the Navy or Coastal Defense. They would be attached for a specific mission.

Each branch chief is responsible to the commander but receives additional instructions and guidance from his branch counterparts at the next higher level. A good example of dual allegiance to the unit commander and a branch chief at the next higher level is the operation of artillery.

From the regional commander's point of view, all artillery organic to his subordinate districts or allocated to the region by the General Staff are under his control. The regional commander directs the chief of artillery at regional level to plan and direct the region's artillery fires to support the concept of the operation. The district's artillery assets are part of the general artillery effort. Centralized fire planning at region level ensures that the proper allocation of resources is made and that weapons engage appropriate targets. The district's chief of artillery is responsible for integrating his fire plan with the fire plan from the next higher echelon. Within the constraints posed by the region's fire plan, the chief of artillery must satisfy the requirements of his commander or resolve any conflicts through coordination. While the possibility for conflict and confusion exists, the OPFOR does not view this as an infringement on command prerogative. The fire plan, for example, is viewed as an aid to planning, not a constraint. The military district commander, for example, learns from the region fire plan which targets must be attacked by the region's artillery. He can then decide which targets to attack with district artillery.

If the system works, the administrative and technical burden on the each commander is reduced, and he can concern himself with the conduct of his maneuver units. The commander at the highest level has centralized control over the assets available to him. This centralized control requires a

need for coordination. This becomes more evident in operations with a wide dispersal of forces, such as a military region defense, than it does in the offensive operations of an expeditionary army.

In addition to the branch chiefs, the deputy commander for the rear may be considered a special staff officer. He advises the commander on supply and rear service matters. He is also responsible for part of the coordinating staff responsibility for logistics.

Command and Staff Procedures

Like commanders from every army, OPFOR commanders must gather information on which to base decisions, convey decisions as orders, and supervise the execution of these orders. The commander relies on his staff to assist him in accomplishing these tasks. As a result, the OPFOR has formalized staff procedures. These procedures can be performed in their entirety only when time is not a factor. Once fast-moving combat has begun, all procedures may be abbreviated.

The OPFOR commander follows procedures similar to U.S. commanders. He makes an estimate of the situation, issues a warning order, considers courses of action that have been researched and presented by the staff, and finally makes a command decision that is approved by the commander at the next higher echelon. The decision is printed in an approved, detailed format and disseminated.

The OPFOR emphasizes the need to be capable of adjusting rapidly to changes in the operational and tactical situation. It understands the dynamics of the modern battlefield, and this emphasis is more prevalent

than rigid adherence to formal procedures. The commander's estimate and decision may take only a few minutes and may be based on limited information. The order may be nothing more than a sentence transmitted by radio or messenger to a regimental commander.

It should be understood that most region- and district-level orders developed in the field already have peacetime contingency plans for a basis. For example, all regions and their subordinate districts have peacetime plans for how a defense of their territorial areas would be conducted. These plans, like the general deployment plans maintained by many countries, are continually refined and updated by commanders and staffs. They also serve as the focus for peacetime CP and field training exercises at all echelons.

Standard Orders

The OPFOR uses two standard orders: **warning** and **operations** orders.

Warning order

The OPFOR attempts to maximize the time available for combat preparations by issuing warning orders to alert subordinate units of an upcoming operation. In the district, for example, the commander receives his mission from the regional commander. This order could be delivered by telephone, radio, messenger, or at a formal briefing. The district commander studies the mission, the concept of the operation, and scheduled support by region units. He analyzes the role of his district in the overall operation of the region. From this analysis, he extracts information that permits his staff and subordinate brigade commanders to be-

gin preparation for combat, and issues this information as a warning order.

The chief of staff organizes the staff to present information to the commander concerning the enemy, terrain, troops available, and weather. From this information, the commander makes his estimate of the situation. If time permits, he makes a personal reconnaissance with his subordinate commanders and staff officers as required to better evaluate the situation. Given sufficient time, written staff estimates are prepared and coordinated for the commander.

The operations section prepares several possible courses of action for the commander's consideration, and the chief of staff indicates his preference. Based on the available data and the recommendations from the staff, the commander makes a decision. The decision may be one of the recommended courses, a combination of two or more recommendations, or a new solution.

Operations order

The commander announces his decision in the presence of the chief of staff, the chief of the operations section, and, when possible, other key personnel such as the coordinating staff, the branch chiefs, and the deputy and subordinate commanders. The final decision is issued as an operations order. When time permits, it contains the following:

Annexes to operations orders are forwarded with the order. If they are incomplete when the order is transmitted, they are sent out separately to prevent delay in transmission of the order. Types of annexes include coordination requirements, intelligence, security, signal, artillery, engineer, movement order, and counterattack plans.

A separate order for logistics is written by the deputy commander for the rear and his staff. The order organizes the rear area, routes of movement for rear elements, supply routes, supply points, sequence and time of resupply, rear area security, and the location of the rear area CP. The order is approved by the unit commander.

COMMAND AND CONTROL OF OTHER BRANCHES OF THE ARMED FORCES

The focus of this handbook is to detail operations conducted by ground forces. The following information focuses on the other branches of the armed forces. A more comprehensive discussion of each of these services can be found later in the handbook.

National-Level

Within the MINDEF, there are deputy ministers who serve as commanders of various services of the armed forces. Besides the Commander of the Ground Forces, there are the following:

- Commander of the Navy.
- Commander of the Air Force.¹
- Commander of the Special Operations Command.

Each service commander is a member of the Main Military Council/Supreme High Command. He has overall responsibility for the forces under his command, and serves as primary advisor on their employment to the Minister of Defense, who is the Commander of the Armed Forces during wartime. The Operations Directorate of the General Staff translates directives from the

¹ Responsible for the Air Force and the Air Defense Command.

Supreme High Command into plans and orders detailing each service's support to strategic- and region-level operations.

Region- and District-Level Control

Region-level staffs have a chief of aviation, who is augmented by his own support element. The chief of aviation is the link between the General Staff and the ground force conducting the operation. His cell advises the commander on the capabilities and uses of air assets, manages requests for all types air support, and maintains communications with air assets operating in the battle area. Size of the support element depends on the mission. Offensive operations usually dictate a larger element. This element provides liaison personnel to subordinate echelons receiving air support. At district-level and lower, these aviation control elements are composed of pilots, who function as forward air controllers.

Air Force

The Commander of the Air Forces is a deputy minister within the MINDEF and is a member of the Main Military Council/Supreme High Command. He has overall responsibility for the Air Force and the Air Defense Command. He is the aviation advisor to the Minister of Defense. The Operations Directorate of the General Staff translates directives from the Supreme High Command into the plans and orders detailing Air Force and Air Defense Command support to strategic and region-level operations.

Navy

The Commander of the Navy is a deputy minister within the MINDEF and is a member of the Main Military Council/Supreme High Command. He has overall

responsibility for the Navy. He is the naval advisor to the Minister of Defense, who is the Commander of the Armed Forces in wartime, regarding employment of naval forces under his command. The Operations Directorate of the General Staff translates directives from the Supreme High Command into the plans and orders detailing naval support to strategic and region-level operations.

Region- and District-Level Control

Regional-level staffs do not normally have a staff element primarily responsible for the integration of naval support. In the event naval assets are planned within an operation, the General Staff would ensure that the appropriate coordinating elements were provided by the Navy. For example, if a regional-level operation is to be conducted along a coastline and naval gunfire might need to be part of the chief of artillery's fire planning, the Navy would probably provide a liaison officer for this function. Also, if a regional-level operation includes an amphibious operation, the Navy would provide liaison personnel for the duration of that operation.

Special Operations Command

The Commander of the Special Operations Command is a deputy minister within the MINDEF and is a member of the Main Military Council/Supreme High Command. He has overall responsibility for the Special Operations Command. He is the primary advisor to the Minister of Defense, who is the Commander of the Armed Forces in wartime, regarding employment of special operation forces under his command. The Operations Directorate of the General Staff translates directives from the Supreme High Command into the plans and orders detailing

special operations support to strategic and region-level operations.

Region- and District-Level Control

Regional-level staffs normally have a staff element primarily responsible for the integration of special operations support. For example, an expeditionary army's offensive would normally be preceded by the insertion of special operations teams to the operational or strategic depth of the offensive prior to its initiation. This liaison element would come from the Special Operations Command. This element would also be responsible for coordinating support requirements for special operations forces.

Chapter 4

Offensive Operations

Offensive actions are the most effective and decisive way to attain a clearly defined objective. This chapter focuses on the operational offensives an **expeditionary army** conducts, supported by the other branches of the armed forces.

The ready pool of forces allows the OPFOR to create **only one** expeditionary army. No single region has the number of mobile forces required for this. However, the General Staff would choose one region as the base for mobilizing such an army. That region would receive national-level assets and standing mobile divisions from other regions, and perhaps mobilize reserves within the region, in order to constitute the required forces.

Although this chapter focuses on the expeditionary army offensive, there are other offensive actions conducted by the OPFOR. These include the following:

A **strategic counteroffensive** would entail commitment of the Capital Defense Forces, which serves as a strategic reserve. This would normally occur in the latter stages of a strategic defensive, to complete the defeat of invading forces.

Military region or district counterattacks are tactical offensive actions within the context of its defense. These actions would be taken by the region or district combined arms reserves or second echelons.

Limited-objective attacks are also possible in military regions or districts adjacent to the region from which the expedi-

tionary army attacks. Separate brigades would conduct these **supporting attacks** to secure terrain or fix enemy forces on the flanks of the army's primary axes of advance

OFFENSIVE PHASING

Strategic planners consider offensive operations a multi-phased conflict that combines both conventional and unconventional warfare assets to achieve political, psychological, and military victory. In this context, the OPFOR phases an offensive in a strategic framework, with subphasing for the operational-level actions. (See Figure 4-1.)

Pre-hostilities

Unconventional warfare is used to weaken the targeted country's institutions and infrastructure, to include its military. This would include activities carried out by guerrillas receiving assistance from Special Operations Command advisors. Late in this strategic phase, the expeditionary army would begin to mobilize and begin receiving combat support and combat service support units allocated by the General Staff.

Hostilities

The insurgency is expanded, and the OPFOR begins conventional operations. Strategically, this phase is divided into initial, subsequent, and final subphases, which roughly coincide with the army commander's operational phases of preparation, attack, exploitation, and pursuit.

Strategic Phases	Pre-hostilities	Hostilities			Post-hostilities
		Initial	Subsequent	Final	
Strategic Forces	Unconventional Warfare				
	Special Operations Forces				
		Air Force, Naval, and Special Operations Support to Expeditionary Army			
Operational Phases	Mobilization	Preparation			
		Attack			
			Exploitation/Pursuit		Consolidation
Operational Forces		Expeditionary Army			
Army Missions		Meeting Engagement			
		Attack Against a Defending Enemy			
				Pursuit	
Mission Variants/ Forms of Maneuver		Attack: Frontal Attack Envelopment Penetration Turning Movement Infiltration	Pursuit: Frontal Parallel Combination		

Figure 4-1. Relationship of strategic and operational offensive phasing.

Initial Subphase

The initial subphase begins with the infiltration of additional special operations forces to be used in support of the expeditionary army's deep battle. It encompasses the army's preparation phase, which includes its march from assembly areas inside the State and meeting engagement with enemy forces, if one occurs. The initial subphase extends through the initial conventional attack until forward defending enemy forces are defeated.

Subsequent Subphase

The subsequent subphase includes the expeditionary army's penetration or defeat of defending forces, its transition to exploitation, and the pursuit (if conducted). It

also includes the successful seizure or destruction of operational targets deep in enemy territory.

Final Subphase

The final subphase encompasses a linkup of conventional and unconventional forces to seize strategic-operational objectives such as the political, economic, and military centers.

Post-hostilities

During this phase, the emphasis switches from military to political objectives. A local government is installed and local leaders are co-opted. The OPFOR must consolidate its positions and develop an integrated defense for the new territory.

OFFENSIVE PLANNING

The Ministry of Defense (MINDEF) has overall responsibility for strategic and operational-level offensive planning. Specifically, the General Staff is charged with translating national policy decisions into feasible plans and directives. The military region with the army offensive mission, in conjunction with the MINDEF, also has responsibility for operational-level planning for offensive contingency missions. Although the other regions are primarily oriented on the defense of the State, they can also conduct limited-objective offensives. These limited offensives are to fix the ground forces of neighboring states, in support of the army offensive.

National-level planning focuses on strategic offensive phasing, integration of the other branches of the armed services, and the combat support and combat service support required by the army, both for the army's initial formation and for sustained operations. At the **region level**, planning focuses on the sequencing of initial mobilization, integration of combat support and combat service support from the General Staff, and the details of the ground operation.

Planning at the **expeditionary army level** must support the conduct of deep operations into the enemy's rear. The army plan may include the following offensive forms:

- **Attack along one or more axes to split the defending enemy into separate or isolated groups.** The attacking army must then destroy these groups while continuing the offensive toward the enemy rear.
- **Attack along converging axes to envelop enemy forces.** The attack-

ing army must then destroy these enveloped forces as the offensive continues into the depths of the enemy defenses.

The choice of axes and forms of attack depends on the nature of the enemy defenses. (See Figure 4-2.) A combination of the two forms may be appropriate.

Success in planning the offensive depends on the timely commitment of reserves and exploitation forces, shifting the army's axis of main effort to a different direction when resistance is too strong, and consequently regrouping forces from less favorable axes. The underlying principle is the continual reinforcement of success and not failure. This principle helps those formations having trouble achieving success. The continuation of the advance can expose to attack the flanks and rear and lines of communication (LOCs) of a successfully defending or counterattacking enemy. The decision to shift an army's main effort onto a new axis is made only by the General Staff. The resultant regrouping must be rapid and secret, quite possibly with attacks being continued on the former axis as deception.

REASONS FOR ASSUMING OFFENSIVE

The primary reason for assuming an operational offensive with an expeditionary army is to conquer neighboring countries. As stated in Chapter 1, the two most probable objectives are to unite ethnically homogeneous areas or to create buffer states. The secondary reason is to conduct a counteroffensive against a weakened invader.

Considering changing political and military circumstances within neighboring countries, OPFOR leaders may view an operational offensive as necessary to ensure the

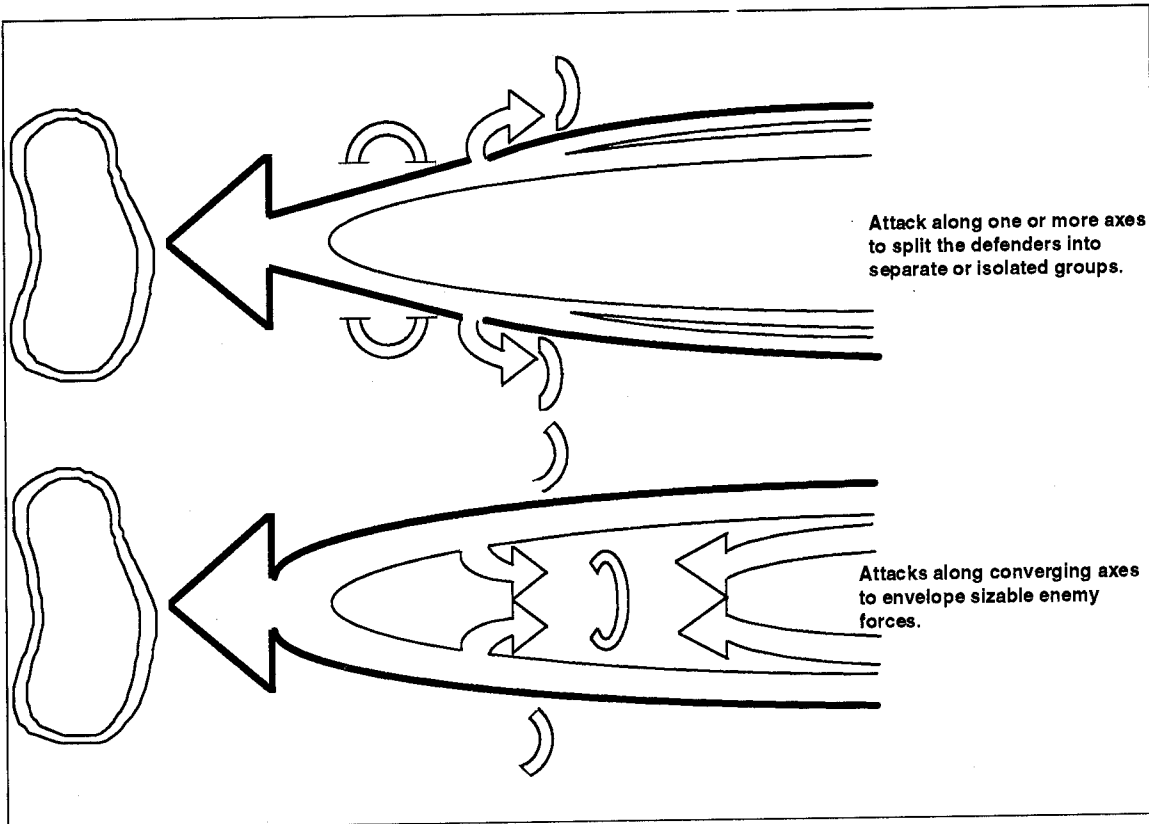


Figure 4-2. Axes of attack.

security of the State. Therefore, the operational offensive is tied to two basic OPFOR political objectives: extending the revolution throughout the region, and preserving and defending the State.

FUNDAMENTALS OF OFFENSE

There are four general characteristics of the offense. These are **initiative**, **surprise**, **speed** and **concentration**.

Initiative

The goals of a campaign or battle and the methods devised for their attainment must reflect **initiative**. The success of these plans rests with the ability of higher-echelon commanders to make bold decisions, then act resolutely to implement those decisions. Success belongs to the force that boldly seizes the initiative. With the initiative, the

State has the freedom of action necessary to dictate the conditions of combat. Initiative allows commanders to shape the battlefield. It is the key to offensive operations.

Surprise

Surprise is striking the enemy at a time or place in a manner for which he is not physically or mentally prepared. Knowing the enemy commander's intent and denying his ability to conduct thorough and timely intelligence is crucial. Avoiding predictability and using deception, cunning, and guile also helps to gain surprise. Surprise is achieved by the direction, timing, boldness, and force of the attack. Surprise delays enemy reactions, overloads and confuses enemy command and control, induces psychological shock in enemy soldiers and leaders, and reduces the coherence of the enemy defense. By diminishing enemy combat power,

power, surprise enables an attacker to succeed with fewer forces than he might otherwise require. Surprise is significant in light of the destructive power of modern weapons systems. It is important to achieve surprise at the operational level in order to overcome any potential enemy's technological advantage.

Achieving total surprise once hostilities have begun is difficult. The proliferation of modern surveillance and warning systems and the presence of global commercial news networks make complete surprise less likely. Nonetheless, surprise can still be achieved by operating in a manner the enemy does not expect. The enemy may anticipate an attack, but he can still be deceived as to its nature, its timing, and its force. Bad weather, seemingly impassable terrain, feints, demonstrations, and false communications can all be used to lull the enemy into false expectations. Sudden and violent attacks have a paralyzing effect on the enemy. So do attacks from unanticipated directions. Airborne, air assault, and special operations forces deep in the enemy's rear tend to have a disconcerting psychological effect on the enemy's equilibrium.

Speed

The offensive is characterized by a high rate of advance. Forces participating in the offensive must, therefore, be mobile. **Speed** may be sacrificed initially while fighting through the enemy defenses. Once a penetration is made, the rate of speed increases considerably. Consistently maintaining the rate of advance rests on striking the enemy before his defensive preparations are complete or finding weaknesses within prepared defenses. The OPFOR attempts to bypass major concentrations of forces and cripple the enemy by destroying or disrupt-

ing his command and control facilities, his logistics system and his ability to reinforce his defense. If forced to confront a defending enemy across the entire frontage of the attack sector, the OPFOR would avoid a costly, time-consuming battle of attrition by developing penetrations and committing highly mobile forces into the enemy rear.

Concentration

Concentration is the ability to mass effects without necessarily massing large formations and is therefore essential for achieving and exploiting success. Concentration of any size force is also a vulnerability. Modern technology makes the process of concentration more difficult and dangerous. To overcome these difficulties commanders manipulate their own and the enemy's concentration of forces by some combination of dispersion, concentration, deception, and attack. By concentrating forces rapidly along converging axes, the attacker overwhelms enemy forces at the point of attack by massing the effects of combat power. At every level, commanders conceal the concentration of their forces until it is too late for the enemy to react effectively. Units mask the patterns of their movement and preparatory activity that might reveal the direction or timing of attack. Commanders monitor their logistical buildups, patrolling activities, communications, and indirect fires to keep the enemy from seeing a visible change in the attacking force's operating pattern. Speed, security, and deception are essential to successful concentration of forces. Concentration requires careful, prior coordination with other services, especially at the military region level. After a successful penetration, attacking OPFOR commanders keep their force concentrated to gain full advantage of its momentum.

FORMS OF MANEUVER

Like many aspects of OPFOR doctrine, the forms of maneuver have seen little change in modern history. They are understood by potential adversaries of the State as well as by OPFOR soldiers. Offensive success therefore depends less on the choice of forms than on their creative combination and especially on the skill and audacity with which they are executed.

Two principal forms of maneuver form the basis for OPFOR offensive actions. These are **frontal attack** and **envelopment**. Both forms can be conducted tactically or operationally. Frontal attacks tend to be employed more often at the tactical level, while the envelopment is considered to be the desired form of maneuver at the operational level. The **turning movement**, **infiltration**, and **penetration** are either combinations or derivatives of the two basic forms

Frontal Attack

The frontal attack strikes the enemy across a **broad frontage** and over the most

direct approaches. (See Figure 4-3.) It is normally used when commanders possess overwhelming combat power and the enemy is at a clear disadvantage. It pressures all enemy defenses in a given sector simultaneously. The attack is characterized by **multiple axes of advance**, with the intent of causing a penetration of enemy defenses in one or more places.

The frontal attack may conceal the axes of main attacks by a combination of deception and strong pressure across the entire area of contact. The less favored form of operational offensive maneuver, it is almost always conducted at the army level with multiple divisions. Each subordinate division designates a main attack sector to cause a penetration of enemy defenses. Frontal attack is also the least economical form of maneuver, since it exposes the attacker to the concentrated fire of the defender while simultaneously limiting the effectiveness of the attacker's own fires.

As the simplest form of maneuver, the frontal attack is useful for overwhelming light defenses, covering forces, or disorgan

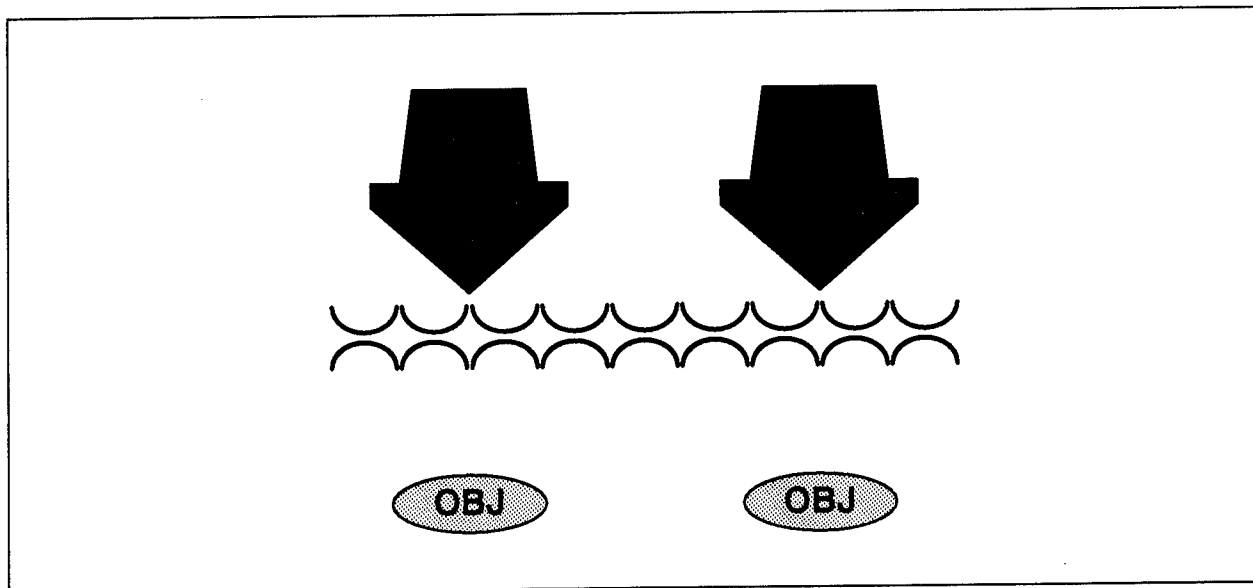


Figure 4-3. Frontal attack.

ized enemy forces. At the tactical level, it is a common form of maneuver to be used by a fixing force as a supporting attack to an envelopment. The frontal attack may also be part of an exploitation or pursuit.

Envelopment

Envelopment is the form of maneuver that applies strength against weakness. It avoids the concentration of forces and fires along the enemy's front. The attacker maneuvers his main effort around or over the enemy's defenses in order to strike him in the flanks or rear. Concurrently, supporting attacks along the enemy's front fix enemy forces in their defenses. Success of the envelopment depends on the creation or discovery of an assailable flank. In meeting engagements or counterattacks, this may actually be the flank of the enemy forces. If the enemy is defending, this is probably a gap or breach of the enemy's defense. There are two types of envelopment: **close envelop-**

ment and deep envelopment. (See Figure 4-4.)

Close Envelopment

The **close envelopment** is a shallow maneuver conducted against the enemy flanks. (Some doctrines, other than OPFOR, would call it a flank attack.) The goal is to strike the enemy defenses/units from the flank, thereby avoiding a frontal attack. It is primarily a tactical maneuver, conducted at division level and below.

Deep Envelopment

The **deep envelopment** is directed at the enemy's rear areas. It is an operational or tactical maneuver in which the division maneuvers past the enemy force to be enveloped and attacks from the rear. The attacker is able to sever the defender's LOCs and prevent reinforcement or withdrawal.

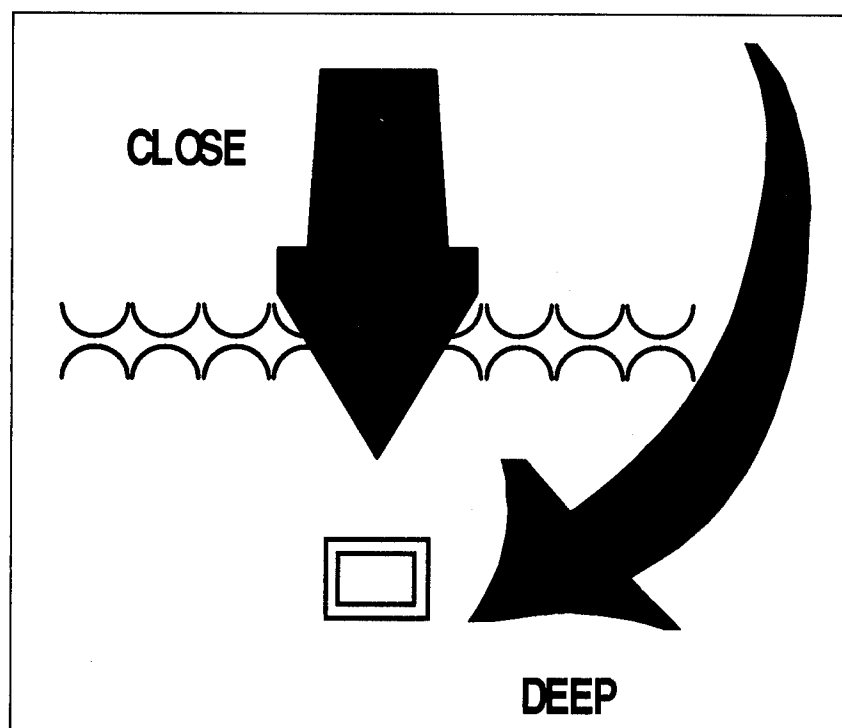


Figure 4-4. Close and deep envelopment.

Turning Movement

The **turning movement** is a variant of the envelopment in which the attacker attempts to avoid the defense entirely and seeks to secure key terrain deep in enemy's

rear and along his LOCs. Faced with a major threat to his rear, the enemy is thus "turned" out of his defensive positions and forced to attack rearward at a disadvantage. (See Figure 4-5.)

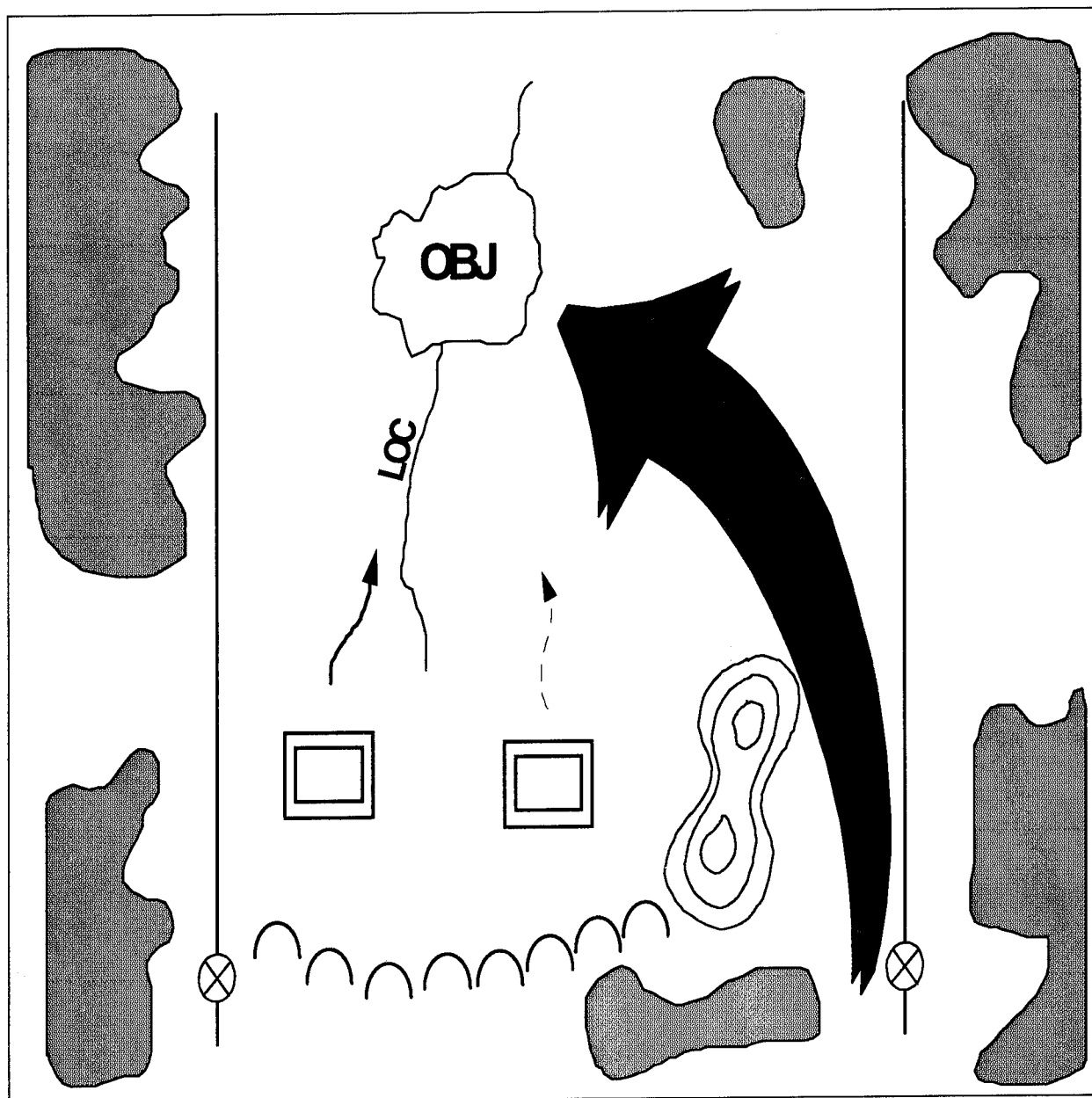


Figure 4-5. Turning movement.

Penetration

A **penetration** is attempted when enemy flanks are not assailable and when time does not permit some other form of maneuver. It attempts to rupture enemy defenses on a narrow frontage and thereby create both assailable flanks and access to the enemy's rear. (See Figure 4-6.) Sufficient combat power is massed at the point of penetration to overwhelm the enemy and gain the advantage. Fires from all available means are massed at the point of penetration to make the breach, hold open the shoulder, and cripple enemy counterattacks. Second-echelon forces rapidly exploit success of the penetrating forces. Since it pits the attacker's strength against the defender's, penetration may result in higher casualty rates than other forms of maneuver.

Infiltration

Infiltration is another means of reaching the enemy's rear without fighting through prepared defenses. (See Figure 4-7.) It is the covert movement of all or part

or the attacking force through enemy lines to a favorable position in their rear. Light infantry units are especially valuable for infiltration operations. Since none of the forces within the expeditionary army are composed of light infantry, these operations would be conducted by dismounted motorized infantry.

Successful infiltration requires, above all, avoiding detection and engagement. Since that requirement limits the size and strength of the infiltrating force, infiltration can rarely defeat the defense by itself, but rather is normally used in conjunction with some other form of maneuver. Infiltration is most feasible in rough terrain and reduced visibility, or in areas poorly covered by observation and fire. It may be used to attack lightly defended positions, or stronger positions from flank and rear; secure key terrain in support of the OPFOR main support; or disrupt the enemy rear operations.

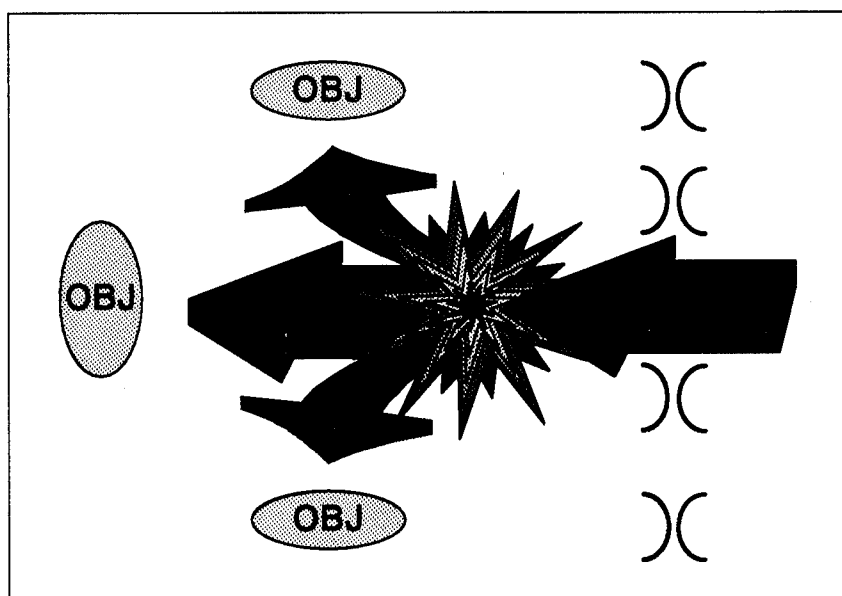


Figure 4-6. Penetration.

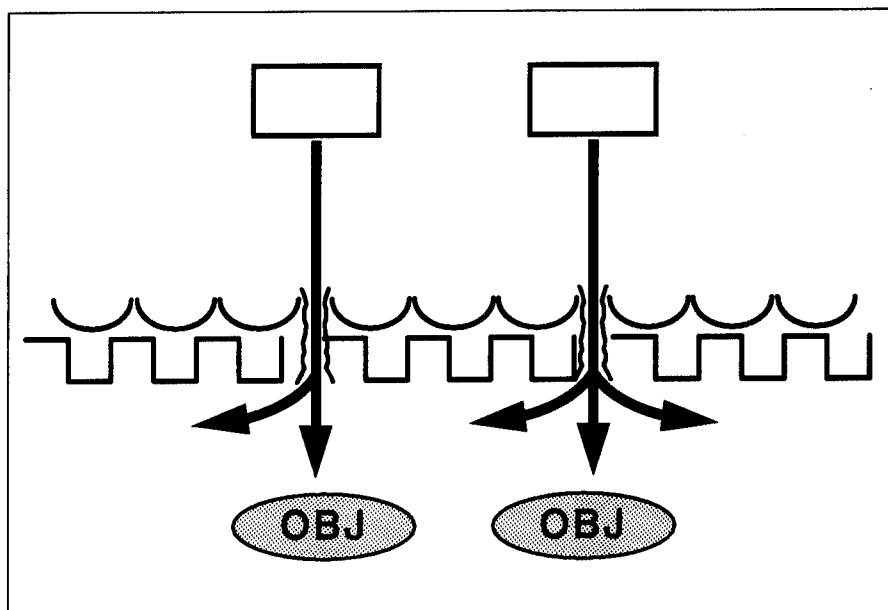


Figure 4-7. Infiltration.

EXPEDITIONARY ARMY OFFENSIVE

The expeditionary army is a wartime formation composed entirely of mobile forces. It is the largest ground maneuver formation of the OPFOR. Its composition and size varies, based on its mission and the probable size and disposition of enemy forces.

The structure of the army, patterned after the forces employed by the former Soviet Union, provides good control and ground-based support for the divisions assigned to it during the ground portion of the operational offensive. The army, and its subordinate formations, are designed to fight as a cohesive unit. This differentiates the army from the region.

The primary role envisioned for the expeditionary army is conducting extraterritorial offensive operations. It is designed to strike throughout the entire tactical-operation depths of the enemy through a

combination of operational maneuver and fires.

The expeditionary army is a highly mobile, lethal force. It is the OPFOR's largest ground formation organized and equipped to conduct operational maneuver. It is designed to drive rapidly toward deep enemy operational and strategic objectives, destroy operational reserves, or maneuver rapidly to the flanks of the enemy force. The expeditionary army should be able to accomplish these tasks on a highly mobile battlefield.

MOBILIZATION AND COMPOSITION OF EXPEDITIONARY ARMY

Although the expeditionary army can be mobilized from the State's resources, all methods of forming and supporting it place a significant drain on maneuver units within military regions, subordinate districts, the national asset pool, and other branches of the armed forces. A **single military region**, its subordinate districts, and their organic

ground forces form the base for an expeditionary army. Since army maneuver forces must be mobile, most of the ground forces garrisoned within the designated region's subordinate districts are motorized or mechanized infantry. However, the General Staff would have to allocate national-level assets, resubordinate standing mobile divisions from other regions, and perhaps mobilize reserves in order to raise the forces required to form an army.

Mobilization

The OPFOR has attempted to maintain a force structure which exceeds that required to defend the State. Maneuver unit disposition, coupled with a flexible support philosophy for the military regions and districts, is more than adequate to defend the State against any conventional threats in the geographical region. Forming the army, however, not only shifts large maneuver forces away from their normal garrisons, but reorients much of the combat support and combat service support assets which regions may require in the defense to the expeditionary army.

Mobilizing the army and conducting offensive operations of this scale could invite the attention and possible intervention of an extra-regional power. This type of intervention would force the State into a national defensive posture when much of its military capability has already been committed to forming the expeditionary army.

Headquarters

The expeditionary army is a joint command, commanded by the region commander. Once the army is formed, he becomes the army commander; the region headquarters becomes the army headquar-

ters. The army commander would always establish at least one additional field operating headquarters forward for commanding and controlling subordinate formations and the forces allocated to the army by the General Staff. The army commander locates with the forward field operating headquarters. His deputy region commander remains at the region's peacetime headquarters facilities to direct the efforts of defensive forces remaining in subordinate districts and coordinate the combat service support for the expeditionary army.

Maneuver Forces

The mission, strength and composition of the enemy determines the army's composition. The expeditionary army would usually be composed of 3 to 5 mobile divisions, which come from three basic sources. In all cases, the divisions are commanded by the commander of the district in which they were either garrisoned or mobilized from the reserves. There are three types of divisions:

Standing Divisions

If a district contains a standing division, the division constitutes the total active duty strength of the district. These divisions, which exist during peacetime, are composed of divisional infantry brigades. Since their combat support and combat service support units are organic, standing divisions require no additional support allocations to conduct a division's missions.

Divisions Formed from Regional "Core" Brigades

If one or more of the region's subordinate districts are composed of separate brigades, some of these separate brigades are designated as "core" brigades. These serve

as the baseline or "core" structure to form the new divisions around. The balance of combat support and combat service support units which comprise the divisional structure come from the national level, or from mobilized support units.

Divisions Mobilized from Reserves

Infantry brigades composing a reserve division mobilize from within the region's subordinate districts. Combat support and combat service support units needed within the divisional structure either come from the national level or are also mobilized from the reserves.

Other Assets

The army may include more maneuver assets, apart from the divisions. In addition to the **tank brigade** normally found at army level, the army could include **separate brigades** directly subordinate to the army commander. These brigades could be pulled from a subordinate district's forces, brought from another region at the direction of the General Staff, or mobilized from the reserves. Since separate brigades are structured and trained to fight independently, they are especially well-suited to forward detachment missions.

Combat Support and Combat Service Support

As detailed in Chapter 2, not all assets required to form an army exist within the region prior to mobilization. They are either mobilized from within the military region or are allocated by national level.

MARCH

Forces mobilized in a region or transferred from another region to form an expeditionary army must move to the area of deployment for an offensive. The march may occur partly on State territory and partly on enemy territory, in anticipation of contact with the enemy.

Rate of March

OPFOR divisions have demonstrated the ability to cover 1,000 to 1,500 km over difficult march routes, with a daily march rate of 300 to 350 km. It is the rule to conduct these marches at night for concealment. Figures 4-8 and 4-9 give the norms for the average speed of march columns and their expected daily performance.

The daily march distance is the distance to be covered by the troops during the march in a 24-hour period. The daily march distance depends on the speed of march of the columns, the length of the marching distance, and the physical capabilities of the drivers and combat and transport vehicles. The length of the daily march of the troops for motor transport columns is 400 km per day. For combined vehicle columns it is up to 300 km. In mountains, jungles, swamps, deserts, and other difficult areas, the average rate of movement and the length of the daily march can be decreased.

Column Type	Paved Roads		Dry, Dirt Roads		Muddy, Hilly, Urban Roads	
	Day	Night	Day	Night	Day	Night
Motorized	30-40	25-30	20-25	18-20	10-15	8-10
Mixed	20-30	14-20	15-20	12-15	10-12	8-12
Notes: <ol style="list-style-type: none"> 1. During fog, reduce day speed 25 to 30 percent. 2. In mountains, desert, arctic, marshy areas, and during winter, reduce performance sharply. 						

Figure 4-8. Average speeds of march columns (km/hr)

Column Type	Paved Roads	Dry, Dirt Roads	Muddy, Hilly, Urban Roads
Motorized	250-350	180-300	80-180
Mixed	200-350	120-240	80-140
Notes: <ol style="list-style-type: none"> 1. To the route measured on the map, add 5 to 10 percent of distance on average terrain and 20 percent in mountainous terrain. 2. Calculation is for march of 10 to 12 hours. Remaining 12 to 14 hours spent as follows: <ol style="list-style-type: none"> (a) Maintenance 3 to 4 hours (b) Serving hot meal 1 to 1-1/2 hours (c) Deployment and camouflage 1 to 1-1/2 hours (d) Movement to line of departure 1 to 1-1/2 hours (e) Rest 4 to 8 hours 3. Rest halts: Short halt of 20 to 30 minutes every 2 to 3 hours (first one after 1 to 2 hours). Long halt of 2 to 4 hours necessary when conducting a forced march of 12 to 14 hours . 4. On a march of over 1,000 km, and possibly even in a shorter one, there is a rest day, probably in the rest area before the final assembly area, for essential repair and maintenance work. 			

Figure 4-9. Daily march performance (km)

Organization of March

The OPFOR uses two types of march columns: **administrative** and **tactical**. It employs administrative march columns in moving where the chance of contact with the

enemy is nil, or at least confined to airborne or heliborne forces. These differ in their organization from the tactical march columns used when moving into or through a battle area.

Administrative March

In the depth of friendly territory, the main purpose for moving in columns is administrative convenience. When a meeting engagement is unlikely, a march column is structured by putting different types of vehicles into separate columns according to their capabilities, so that high rates of advance are maintained and pressure on personnel and combat equipment is decreased. Vehicles of similar type, speed, and cross-country capability may move together in packets rather than mixed with other vehicles as they are when prepared for combined arms combat. Tracked vehicles and heavy equipment may move on one route (preferably paved) while wheeled vehicles may move on another route (possibly unimproved dirt road). This should ensure rapid deployment of troops into combat formation.

A division using two routes is about 100 km deep (exclusive of march security elements). Therefore, the length of the army first-echelon columns, including forward-deployed combat and logistic support elements, is about 150 km. An interval of between 80 to 100 km separates first- and second-echelon divisions; however, reconnaissance patrols and advance guards from a second-echelon division may move within that interval. A second-echelon division using three routes is about 80 km deep. The total length of the army's columns marching in seven routes is about 300 km. If only five routes are available, the depth of the expeditionary army could extend to 500 to 600 km. The army's width would be 150 to 200 km.

Tactical March

The OPFOR is keenly aware of the importance of tempo and the likelihood of meeting engagements (battles) on the mod-

ern battlefield. Therefore, it emphasizes that, when contact becomes possible, march organization must reflect the desired organization for combat. In the event a meeting engagement is likely, the march column is structured in accordance with the upcoming battle.

There is no time to stop and transition from an administrative march column to a battle formation. Formations must flow smoothly and quickly from the march into battle in preformed groupings tailored for combat against the expected enemy in the terrain where battle may occur. This makes it possible to strike first against the enemy in a meeting engagement and to surprise a defending enemy through the speed with which the OPFOR can mount an attack. Once in the combat zone, the OPFOR deploys stronger march security on any open or threatened flank. It may form forward detachments in readiness to conduct deep battle. Movement support detachments tailored to the terrain and the degree of enemy route-denial effort, follow immediately behind the forward security element or possibly behind advance guard battalions. If the OPFOR anticipates a meeting battle, attack against an ill-prepared or overextended enemy, or pursuit, the first echelon is normally tank-heavy and forward detachments can probe ahead. The army artillery group (AAG) usually moves in the first echelon so that its deployment is unhampered and timely; in the same way, the division artillery group (DAG) often moves at the front of a division's main body. Antitank reserves and mobile obstacle detachments move on a threatened flank or forward within the main body and ready to deploy to either flank. Second-echelon divisions/combined arms reserves and CPs move on the main axis.

Moving from the final assembly area to the line of commitment, a first-echelon division can spread out more to observe tactical intervals. (See Figure 4-10.) Intervals between first-echelon brigades and the division's second echelon or combined arms reserve grow from 5 km to 10 km. There should be 5 km between battalions. If possible, the divisions would move on three routes each; therefore, their depth would remain about the same as before. The 80- to 100-km interval between first- and second-echelon divisions remains constant.

Maskirovka

The OPFOR recognizes the problem of concealing the march of a major formation from modern intelligence-gathering means, even when in the operational depth. It also recognizes the effectiveness of deep interdiction executed with long-range, high-precision conventional weaponry, or even with conventional air power. These threats increase the need for *maskirovka*. Measures used to cover operational marches include the following:

- Strict secrecy regarding march routes, assembly and rest areas for road marches. (Even division commanders receive no more information than the next day's stage.)
- Secrecy regarding loading and unloading areas for rail marches.
- Tight emission control.
- Avoidance of population centers where possible.
- Marching only at night when possible.

- Attention to camouflage in rest areas.
- Use of disinformation and false radio traffic.

It may not be possible fully to conceal the conduct of a march. It may, however, be possible to conceal the size of a formation and to simulate march columns on false routes. For instance, the OPFOR makes extensive use of corner reflectors and other devices to confuse enemy radar reconnaissance as to which are real and which are false march routes, and perhaps to conceal the direction of a march. Going against norms known to enemy intelligence collectors may also help to confuse and deceive. Such norms could include speeds of movement, column intervals, or locations of rest areas.

March Security

While reconnaissance units act as the eyes and ears of the army and its subordinate divisions, other units provide security for the main body. Security elements are categorized by their position relative to the main body, as forward, flank, and rear. The **forward security** element is part of the advance guard. **Flank and rear security elements** complete the all-around security for an expeditionary army on the march. For purposes of illustration (see Figure 4-11), the expeditionary army consists of five divisions. It would normally be configured with three divisions in the first echelon and two in the second echelon.

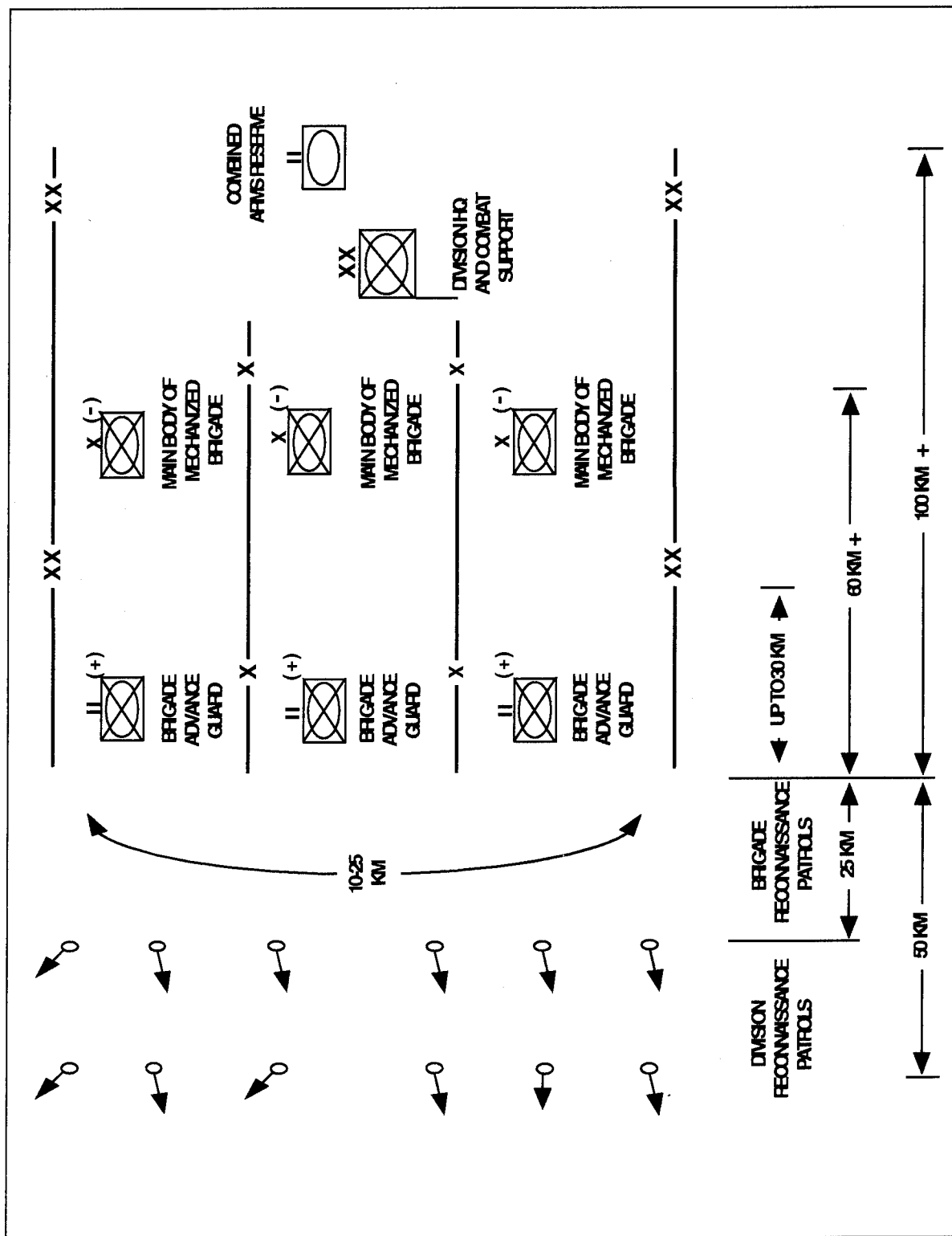


Figure 4-10. Division tactical march (variant).

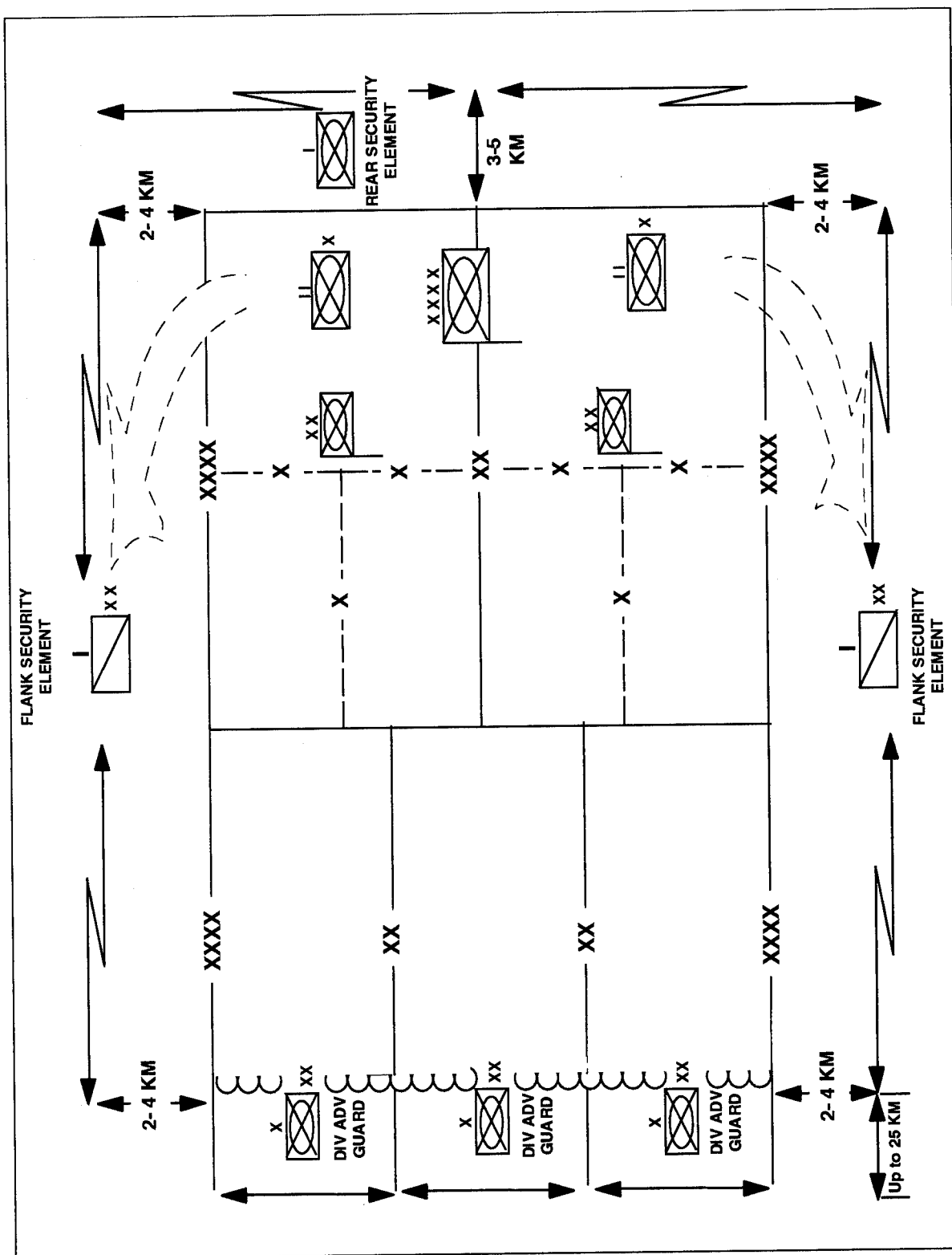


Figure 4-11. Security of expeditionary army (composed of five divisions) in the march.

Advance Guard

The most important of these units is the advance guard, which deploys forward in anticipation of a clash with the enemy. The advance guard deploys up to 25 km from the division main body to prevent an enemy surprise attack, forestall penetration by enemy reconnaissance into the vicinity of the main body, and create favorable conditions for the deployment of the main body and its introduction into battle. The advance guard can engage and destroy enemy units but only if that combat does not inhibit fulfillment of its primary task. The first-echelon divisions provide the advance guards of the army march formation. For a division, the advance guard consists of a brigade-sized force. For an army, it is normally division-sized.

Flank Security Elements

Second-echelon divisions provide a reconnaissance company (from their organic reconnaissance and REC battalions) or an infantry company (from one of their brigades) to serve as **flank security elements**. Flank security elements are sent out a distance of 2 to 4 km on either flank. The division on the right flank provides security for the right flank and the division on the left flank provides security for the left flank. The company does not report to the army. It reports to its parent division, which in turn reports to the army.

When the company detects a company-sized or smaller enemy force approaching the division's flank, it either destroys the force or notifies the division while maintaining contact with the enemy. The division could then dispatch a company or battalion of its second-echelon brigade to destroy the approaching enemy force. If the enemy

force is battalion-sized, the division would either commit its combined arms reserve to destroy the force or request support from army level, which would entail commitment of the army combined arms reserve. This reserve would be under the operational control of the division responsible for the flank into which the enemy is approaching, until the enemy is destroyed. If the enemy force is a brigade-sized, the army commander may maneuver one division to envelope and destroy the enemy force.

Rear Security Elements

An infantry company from each division's second-echelon brigade would be dispatched to serve as a **rear security element**. Rear security elements are sent out from 3 to 5 km to the rear of the main body. The line of communication (LOC) begins at the point where the rear security element's responsibility ends. Security of the LOC is the responsibility of the supporting military region deputy commander for the rear.

Line of Communication (LOC) Security

LOCs for the expeditionary army must remain open. How to secure them, and thereby keep them open, is a responsibility of the deputy commander for the rear at all echelons. However, the **region's deputy commander for the rear** bears the largest measure of responsibility, since he is responsible for providing continuing support to the expeditionary army once it launches from the military region.

Within the region, LOCs from logistics bases and region depots could be interdicted by insurgent forces operating in the State or by invading conventional forces. Once the expeditionary army moves deep

into enemy territory, LOCs from the region are especially vulnerable to conventional enemy forces, or enemy forces conducting partisan operations much in the same way the OPFOR's own defensive doctrine dictates.

Within the territorial boundaries of the military region, the deputy commander for the rear may use militia or reserve units at towns and villages along the route or as convoy security. He may decide to use border patrol or police forces for this role. He may also coordinate air support, artillery, and reconnaissance. Once the LOCs cross the border of the State, the deputy commander for the rear may use reinforcements destined for the army in the convoy escort role. Towns and villages along the route may be occupied by reserve units activated specifically for this purpose.

OPERATIONAL FORMATION

The army's formation for combat is quite flexible. The operational formation may include:

- An army forward detachment.
- A first echelon.
- A second echelon.
- A combined arms reserve.
- Special reserves.

If enemy defenses are not well prepared in depth or supported by operational-level reserves, the army would probably attack in a single strong echelon followed by a combined arms reserve. (See Figure 4-12.) If the enemy is prepared in depth and does have operational reserves, the army would probably attack in two echelons. (See Figure 4-13.) The rule of thumb is that, if the enemy defense has an operational second echelon (or reserve), the OPFOR would

employ an operational second echelon to sustain the momentum of the offensive.

First- and second-echelon forces operate in concert to destroy defending enemy forces before them, up to assigned mission (objective) depths. Second-echelon forces of an army normally are committed after the first echelon has attained the army's immediate mission (objective).

Forward Detachments

Although primarily a tactical grouping, the army commander may form **forward detachments (FDs)** at the army level. Since the army commander can only form one FD in any given phase of the offensive operation, its objectives lie along the army's main axis of advance.

The mission of the army FD is to seize critical lines in advance of the army in order to facilitate its fastest possible advance. Just as with FDs formed at the division level, the detachment's operations are preemptive in nature, intended to prevent the enemy from establishing defensive positions. Secondary missions include destroying covering forces and engaging enemy reserves to prevent them from influencing the main battle.

At army level, the FD is usually a motorized or mechanized infantry brigade, either divisional or separate. If the army has a separate brigade under its control, it would be used; separate brigades are designed to fight independently and have the needed mobility, robust organic reconnaissance, and organic combat support and combat service support. If a divisional brigade is used, it would come from a division in the second echelon.

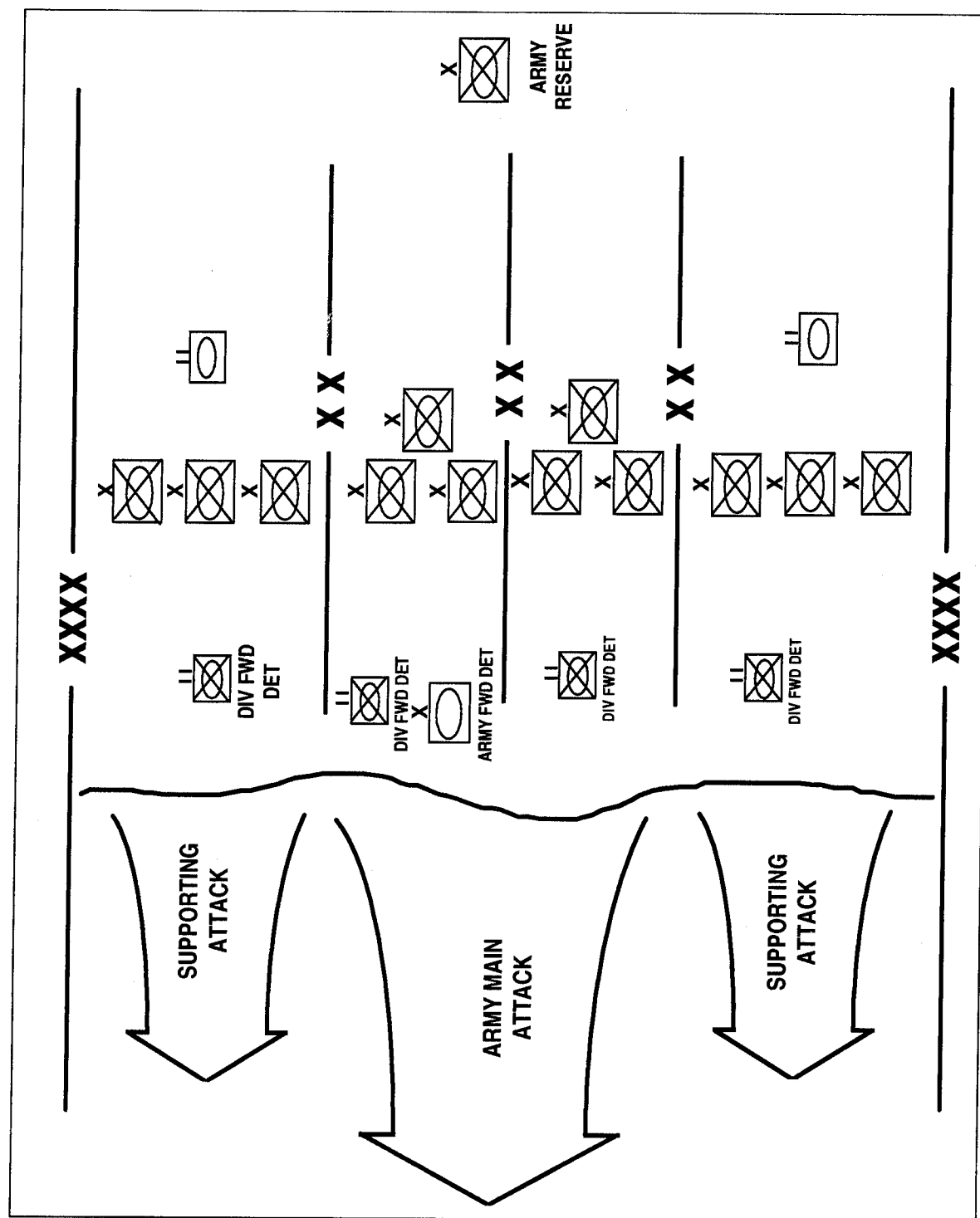


Figure 4-12 Army formation against an unprepared defense.

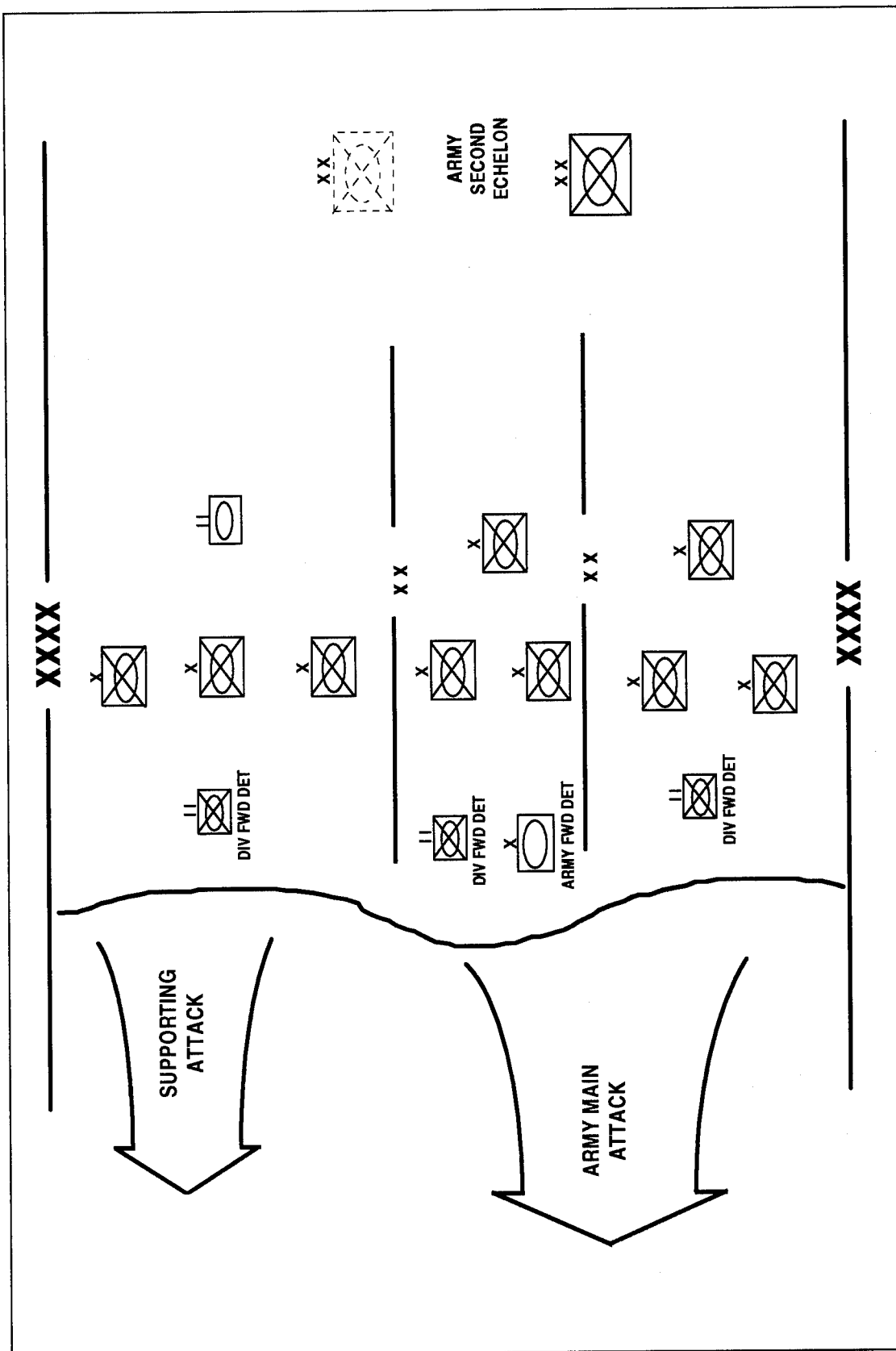


Figure 4-13. Army formation against a partially or fully prepared defense.

Reconnaissance

Reconnaissance units organic to the brigade precede all other FD elements at depths of 30 km or more. These patrols report on enemy locations, avoid contact, and focus on the terrain objective of the detachment.

Advance Guard

The FD commander designates one battalion to act as the **advance guard**. The advance guard battalion moves along a single route, tasked with the following missions:

- Ensuring the main body of the detachment moves unhindered.
- Ensuring suitable conditions for commitment of the main body.
- Warning the main body of surprise attack.
- Preventing penetration of the main body by enemy reconnaissance.

The advance guard battalion commander designates one of his three infantry companies to act as a **forward security element**, which moves up to 10 km forward and provides security for the main body of the advance guard. In the event of enemy contact, this company can sweep away minor opposition or act as the pivot for the main body of the advance guard to maneuver and defeat the enemy force. If the forward security element is unable to accomplish this, the advance guard battalion performs the same function for the FD main body.

The advance guard battalion commander then designates up to three infantry platoons from one or more of his infantry companies to act as **combat reconnaissance patrols**; these patrols operate at depths up to 15 km in front of the forward security ele-

ment. Unlike the reconnaissance patrols operating at greater depths, these combat reconnaissance patrols focus on enemy forces. Although primarily used for reconnaissance, these patrols may also perform combat missions. They operate off the main route of their parent battalion from concealed positions where they can best report on enemy activity.

Main Body

The FD **main body** normally moves on one or two routes in battalion columns up to 30 km behind the advance guard. The brigade headquarters element normally leads the main body, followed by the artillery battalion, antitank and air defense units, maneuver battalions, and combat service support elements. In dissected or heavily wooded terrain, battalions in the main body may designate infantry platoons to act as flank or rear security elements, operating up to 5 km from their parent battalion.

Commitment

Commitment of the detachment depends on the enemy situation. When facing unprepared defenses, the FD may precede the army on its main axis and be committed prior to battle. When facing partially or fully prepared defenses, the detachment may be designated, but held out of the battle until a breach is created, facilitating a smooth commitment into the enemy's defensive depths.

Army First Echelon

Composition of the army's first echelon depends on enemy forces, particularly his level of preparedness. Against **unprepared defenses**, the first echelon could be composed of four divisions, with attack

zones for each of the divisions ranging 8 to 20 km. Each first echelon division would attack on its own axis, with situation-variable spaces between divisions. Against **partially or fully prepared defenses**, the first echelon could be composed of either two or three divisions, with the remainder in the second echelon. One or two divisions of the first echelon conduct the main attack; the remainder conduct supporting attacks. Attack zones for first echelon divisions in the main attack range between 8 and 15 km; supporting attack zones range between 15 and 30 km.

Close Operations

Close operations bear the ultimate burden of victory or defeat. Close operations involve the fight between the committed forces and the readily available tactical reserves of both combatants. This includes combat support and combat service support units. At the operational level, close operations are comprised of the efforts of subordinate divisions. At the tactical level, close operations are comprised of the efforts of brigades and below to win the battles.

Penetration

When facing a **partially or fully prepared defense**, the first echelon must achieve a penetration of enemy defensive positions in order to achieve the mission depths discussed previously. Collectively, the divisions comprising the first echelon are expected to destroy the enemy's corresponding first echelon (immediate mission) and develop the offensive into his depth (subsequent mission). Given the power and mobility of modern divisions, the first echelon is expected to penetrate to the entire tactical depth of at least a partially prepared defense (the rear boundaries of forward en-

emy divisions) before additional forces have to be committed to maintain momentum.

First-Echelon Divisions in the Attack

An attack is normally mounted from the march, from concentration areas out of contact. First-echelon divisions have their final assembly area 20 to 40 km from the enemy forward edge. Covering forces would be deployed 1 to 5 km from the enemy. The OPFOR is then out of range of preemptive artillery strikes, but still only a few hours night march from the forward edge. If the enemy has a covering force deployed, first-echelon divisions may form and deploy FDs. These FDs may come from the second-echelon brigades of first echelon divisions, possibly augmented by strong artillery and air support. The main bodies of the lead divisions follow the FDs in tactical march or prebattle formation in an attempt to attack the enemy hard on the heels of its retreating covering force. The FD may achieve a penetration. If, however, resistance in the enemy security zone is very strong, it may be necessary for first echelon brigade, and possibly divisions, to be committed.

Divisions echelon their forces, just as the army does. A division normally attacks with most of its combat power in a **first echelon or a single strong echelon**. The remaining forces are organized into a second echelon or combined arms reserve. Within the division's attack zone, a main attack axis is designated, based on terrain, disposition, or the order received from the expeditionary army commander. Within their brigade zones of attack, one or two of the first-echelon brigades would attack on the main attack axis. Within the division's zone of attack, another first-echelon brigade would

conduct a supporting attack. Brigade zones of attack range between 3 and 8 km.

A **second-echelon brigade**, if employed, normally has the mission to continue the attack against a deeper objective along the main attack axis. Usually, commitment of the second-echelon brigade takes place after the first-echelon brigades have achieved the division's immediate objective. The time of commitment, however, depends on the success of the first echelon. The second echelon is committed when and where it can best contribute to success of the division's mission. The commander may elect to commit it on an alternate axis (i.e., behind the supporting attack). Before being committed, the second echelon advances on multiple axes 15 to 30 km to the rear of the first echelon. This distance keeps the force close enough for ready commitment, but far enough away to protect it from the enemy's direct and indirect fire systems.

Forward Detachments of First-Echelon Divisions

In the offense, the mission of the FD is to seize critical lines, usually terrain, in advance of its parent unit in order to facilitate the latter's advance. Any terrain that, if held by the enemy, would impede the movement of the main body can be designated critical terrain. This could include passes, road junctions, or population centers. FDs are also employed to defeat enemy covering forces. Elements of FDs may conduct raids against key targets en route to their objectives.

Each first-echelon division may form one FD. Forces normally come from the division's second-echelon brigade. The FD is a combined arms force, built around a reinforced maneuver battalion (mechanized or

motorized rifle). It is typically reinforced with tank/motorized rifle, artillery, antitank, air defense, and engineer forces. Additional support for FD operations is provided by artillery, fixed-wing aircraft, and combat helicopter strikes. In the march, detachments organize in an advance guard formation, similar to that employed by the advance guard battalion of the army FD discussed previously.

Division FDs could advance during the night before the offensive. Collectively, they attack on multiple axes across the army's offensive zone to penetrate enemy covering forces. Individually, each FD moves on a single axis. Then they drive at top speed in prebattle or march formation to seize and hold key terrain within the enemy's main defensive area.

FDs are often employed in conjunction with tactical air assaults. If a tactical air assault has landed along the axis of march, the detachment would take all measures to link up with it as quick as possible and to accomplish the mission by decisive joint operations. Battalion-sized heliborne assaults designed for linkup with the FDs also could be employed.

The division FD moves well ahead of the advanced guards of the first-echelon brigades but behind the divisional reconnaissance patrols. Unlike brigade advance guards, the FD does not follow a specific axis of advance and attempts to avoid enemy contact en route to its objective.

The FD usually moves in column from the attack position (forward assembly area), with reconnaissance and security forward. However, the formation used by the FD is dependent on the degree of contact with the enemy. The column structure must

ensure that the FD can operate separately from the main forces and can deploy into prebattle and battle formations. The degree of dispersion and structure of the column depends on the nature of the mission, the concept for the forthcoming battle, enemy groupings and resistance, and terrain.

Army Second Echelon

The mission of the second echelon, if formed, is to complete the penetration and conduct deeper exploitation of enemy tactical and operational defenses. These forces are responsible for attaining the expeditionary army's subsequent mission, which includes completing the destruction of the enemy corps and destroying the integrity and cohesion of the army group (if any).

It is employed to accomplish one or more of the following:

- Develop the success of the first echelon on the main attack axis.
- Conduct pursuit.
- Breach deep defense zones.
- Defeat counterattacking groupings and destroy them in flank and rear attacks.
- Destroy bypassed groupings which threaten the development of the operation or unduly restrict deployment and limit operational flexibility.

The second echelon is normally composed of one motorized or mechanized infantry division. In attacks against fully prepared defenses, it may be two divisions. It is formed and receives its mission at the same time as the first echelon. Once formed, the second echelon is held in a concentration area 40 to 80 km to the rear while the first echelon is achieving the penetration. It then follows the leading division at a distance of 50 to 60 km until committed. Its

division artillery may be temporarily detached to augment artillery support for the penetration.

Moving by bounds behind army first-echelon forces, it is dispersed laterally on multiple routes to minimize vulnerability to enemy detection and attacks. Based on the development of the battle and on his assigned mission, the army commander commits his second echelon at the most opportune time and place. Normally, it is committed after the first echelon attains the army's immediate mission. Ideally, commitment follows a clean breach in the enemy defense at night, leaving a sector 12 to 20 km wide. Once a second echelon is committed, it is considered essential to establish a new one, or a reserve. Usually, a reserve is constituted, since forming another second echelon would entail using strategic reserves, such as the Capital Defense Forces.

A second-echelon division would probably use three routes to generate maximum combat power going into the attack. The division may be augmented by elements of the first echelon and/or the AAG with maximum air and artillery support. In order to complete the penetration, a frontage as narrow as 5 km may be needed.

Army and Division Reserves

Reserves fall into three categories: **combined arms, antitank, and special.**

Combined Arms Reserve

A **combined arms reserve** is always formed when the army attacks in one echelon. If the operation is likely to develop in a highly fluid, unpredictable fashion, a combined arms reserve may be formed instead of a second echelon. It is usually one-ninth of

the overall force. This function may be fulfilled by either the tank brigade or a separate infantry brigade subordinate to the army. The division may use the tank battalion, if present, or a reinforced infantry battalion from a brigade in a supporting attack sector.

The reserve is not initially given a mission. Directly subordinate to the army or division commander, it is held as a contingency force used to meet unanticipated requirements, such as exploiting unforeseen success, repelling counterattacks, and covering the flanks of the parent organization. Ideally, the reserve would be committed to exploit success upon achievement of the formation's immediate mission. It is given only a route and methods of advance.

Antitank Reserve

Working in conjunction with mobile obstacle detachments, **antitank reserves** are formed at both army and division levels, and used to repel counterattacks and/or provide flank security. They are usually based on the antitank battalions organic at both echelons, but may be reinforced by tank and/or mechanized or motorized infantry units. Antitank reserves provide a means to defeat armored threats without having to weaken an attack echelon. They travel between the first echelon and the second echelon/combined arms reserve, along the axis of the main attack. Commitment lines are planned across the enemy's most likely counterattack routes.

Although not classified as a reserve, the **mobile obstacle detachment** is frequently employed in conjunction with the antitank reserve. It is an engineer grouping with rapid minelaying and usually antitank ditching and obstacle creating capabilities.

It usually supports the antitank reserve, though it may help prepare defensive positions for a transition to the defense. The efforts of mobile obstacle detachment may be supplemented by artillery or air delivery of scatterable mines.

Special Reserves

Special engineer, chemical protection, or medical reserves are often formed to reinforce efforts on the main axis. They may also be used to deal with unforeseen problems.

TYPES OF COMBAT ACTION

An expeditionary army carries out three basic forms of combat action, all of which may occur in the course of an offensive operation. The OPFOR defines these in terms of the postures of the attacker and the defender, not the time available. These are: the attack against a defending enemy, the meeting engagement, and the pursuit.

Attack Against a Defending Enemy

If the OPFOR is attacking and the other side is defending, it is defined as an **attack against a defending enemy**. The attack against a defending enemy is the most likely type of offensive action. It is a fully synchronized operation employing the effects of every available asset against the enemy defense. There are two methods of conducting an attack against a defending enemy: **from the march** or **from positions in direct contact**.

Attack from the March

An **attack from the march** is launched from march formation out of assembly areas in the rear. It is the preferred

method because it increases the chance for surprising the enemy, decreases vulnerability to enemy indirect fires, and enhances speed. Its disadvantages are that commanders may not have a clear picture of the enemy's disposition, and complete synchronization of maneuver assets and fires is harder to achieve.

The OPFOR see two possible scenarios of the attack from the march, based on whether the enemy has an unprepared defense or a partially or fully prepared defense. In an attack on **unprepared defenses**, the army would in essence conduct a series of meeting engagements. Divisions would go rapidly deep to secure strategic objectives, then bring in light infantry as occupying forces. In an attack on **partially or fully prepared defenses**, the army would attack, envelope, and destroy the bulk of the enemy force, then pursue until the enemy is destroyed.

Attack from Positions in Direct Contact

An **attack from positions in direct contact** is launched from a position which may be part of or immediately behind defensive positions. It is most often used when changing over from the defense to the offense. Its advantages are that it allows a more thorough examination of the terrain and the enemy, and that more thorough planning and synchronization of assets is achieved. Its disadvantages are that there is less chance of surprise, momentum is harder to achieve, and units are under the constant threat of attack during their reparations.

Meeting Engagement

If both sides are attempting to fulfill their mission by offensive action, the

OPFOR defines this as a **meeting engagement**. As an operational formation, an army conducts a meeting engagement. Its subordinate divisions and brigades conduct **meeting battles**. Meeting engagements are characterized by:

- Rapid changes in the situation.
- Limited time to organize.
- Combat on a wide frontage with the purpose of maneuvering forces to strike the flanks and rear of the enemy.
- Introduction of forces from the march in prebattle or battle formations.

Conditions

Meeting engagements occur under various circumstances. (See Figure 4-14.) They may occur at the beginning of the war, when operational units are brought forward to meet an attacking enemy or when an attacking force meets an enemy moving forward to occupy initial defensive positions. Meeting engagements may also occur during an OPFOR offensive, when an enemy's counterattack or advancing reserves are encountered. A meeting engagement is also possible when an OPFOR counterattack meets an advancing enemy force.

The expeditionary army is most likely to conduct a meeting engagement at the beginning of the offensive, after the army has launched across the State's border into a neighboring country. Divisions subordinate to the army are most likely to conduct a meeting battle with the enemy's reserves during the exploitation phase, after the army's second-echelon division is committed through a penetration of the enemy's defenses.

Composition and Disposition

If the enemy's disposition of forces is not known, the army commander could form an advance guard with approximately one-third of his combat power. This is normally a mission given to one of the divisions. The division would travel along the army's main axis, also configured with one-third of its combat power forward as an advance guard. This is normally a mission given to one of the division's brigades. The overall effect is a "telescoping" of combat power, from the army's main body forward to its advance guard division, and within this division from its main body to its advance guard brigade. At either echelon, the advance guard is tasked to--

- Ensure the main force moves unhindered.

- Ensure suitable conditions for commitment of the main force.
- Warn the main force of surprise attack.
- Prevent penetration of the main force by enemy reconnaissance.

The initial phase of the meeting engagement or battle is the period of combat from the time of enemy encounter by the leading advance guard element to the commitment of the main body. Employment of the main force depends on the success of the advance guard. If the advance guard is successful, attack by its subelements destroys the enemy force, the advance guard resumes the march, and the main body never deploys. If the advance guard is not initially successful, however, it would attempt to fix

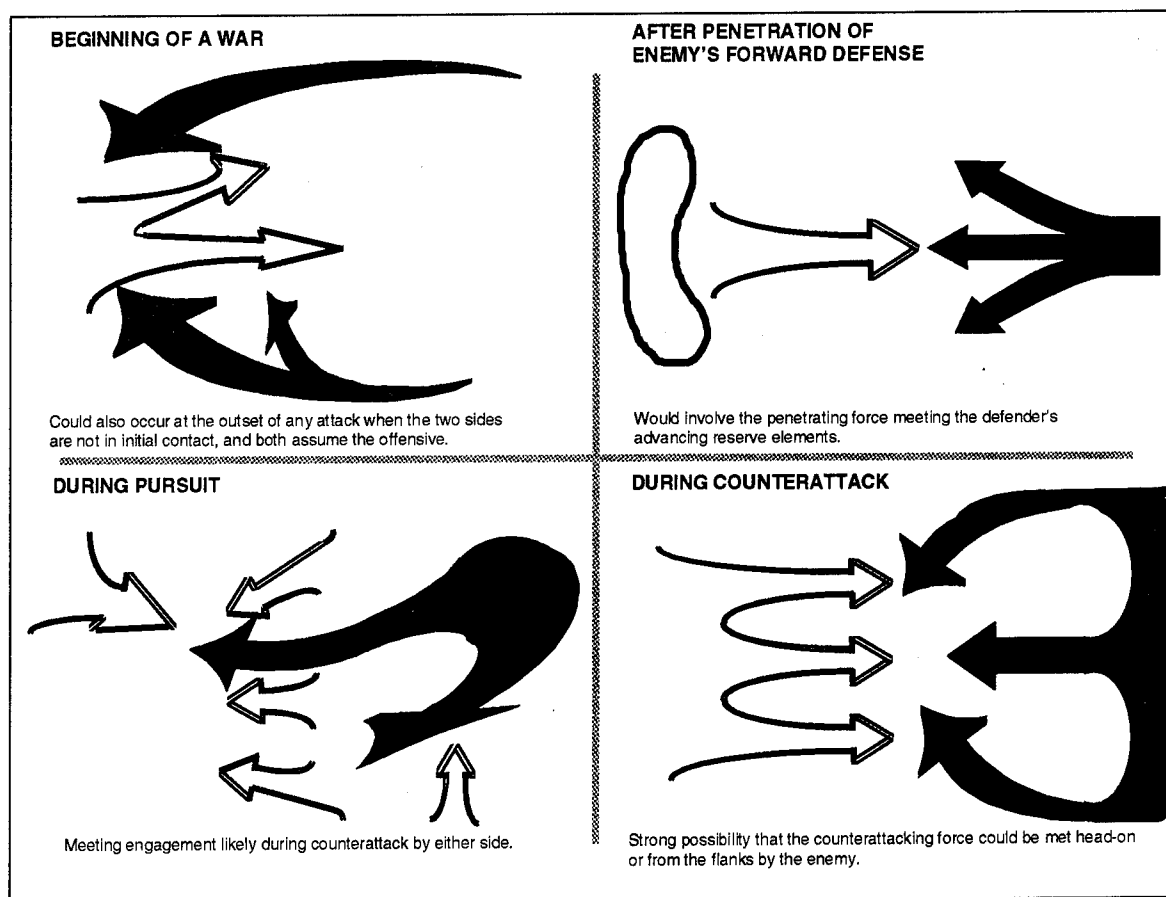


Figure 4-14. Conditions for a meeting engagement.

the enemy force. The main body would then deploy to destroy the enemy force, using one of two forms of maneuver: an envelopment or a frontal attack. The envelopment is the preferred form of maneuver.

Success in the meeting engagement normally goes to the side that not only achieves some degree of surprise, but also seizes and holds the initiative. A smaller force that seizes the initiative, though it lacks detailed knowledge of the enemy and elaborate plans of its own, may defeat a larger force. The meeting engagement concludes when one of the following occurs:

- Continuation of the march, due to defeat of the enemy force.
- A transition to the pursuit, if the enemy withdraws.
- A transition to the defense, if the OPFOR is unable to overcome the enemy force.

Pursuit

If the enemy is retreating and the OPFOR is attacking, this is a **pursuit**. The goal of the pursuit is to complete the destruction of the enemy. The pursuit is executed by blocking the enemy's withdrawal routes and destroying the enemy in a series of attacks. The pursuit phase begins when the enemy is either routed or attempts to break contact in a preplanned withdrawal. The pursuit may end:

- When the enemy forces are destroyed.
- When pursuing elements outdistance their support and are in danger of being cut off.
- When the enemy successfully establishes a strong defensive position.

Pursuits can be conducted at both the operational and tactical levels. Operational

pursuits are conducted by the expeditionary army on a broad frontage. Tactical pursuits are conducted by divisions or their brigades, and are more limited in scope. Commanders at all echelons from brigade to army do the tentative planning for the pursuit in the initial attack plan, and they are expected to move independently into a pursuit once the enemy begins to withdraw. Once initiated, the pursuit can be terminated only on the orders of the next-higher commander. The three basic forms of pursuit are **frontal**, **parallel**, and **combination**. The most effective is the combination of the frontal and the parallel.

Frontal

The frontal pursuit is conducted by units in contact. It is the most likely type of pursuit under the following conditions:

- At the beginning of the enemy's withdrawal.
- In limited visibility.
- When there are no parallel bypass routes.
- When strong pressure is required to keep the enemy from disengaging from combat.

The aim is to force the enemy to accept combat under unfavorable circumstances and delay his withdrawal. (See Figure 4-15.)

Parallel

This high-speed pursuit is conducted on routes parallel to the enemy force. It allows the pursuing force to conduct surprise attacks on the enemy's flanks and to cut off withdrawal routes. However, it also allows the enemy room to maneuver and possibly counterattack. (See Figure 4-16.)

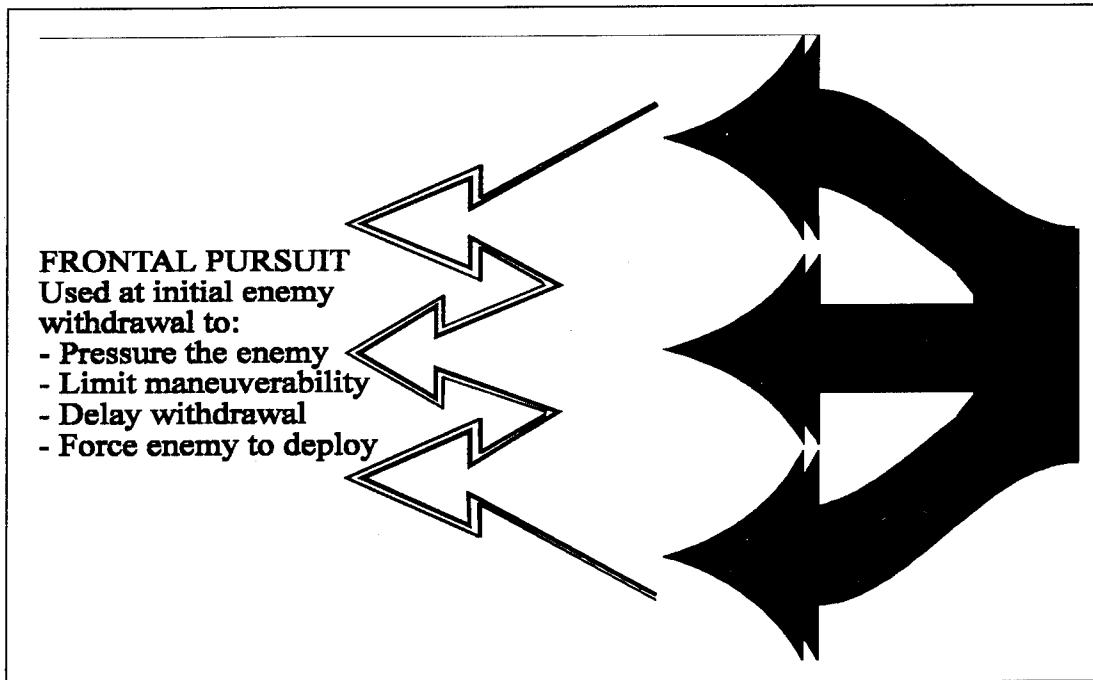


Figure 4-15. Frontal pursuit.

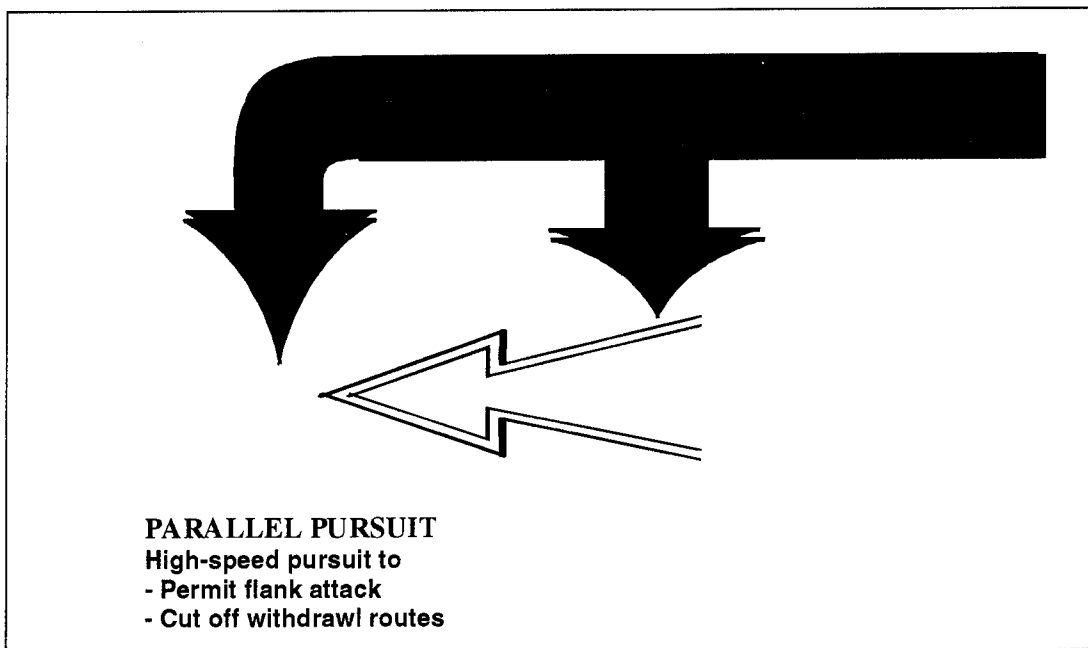


Figure 4-16. Parallel pursuit.

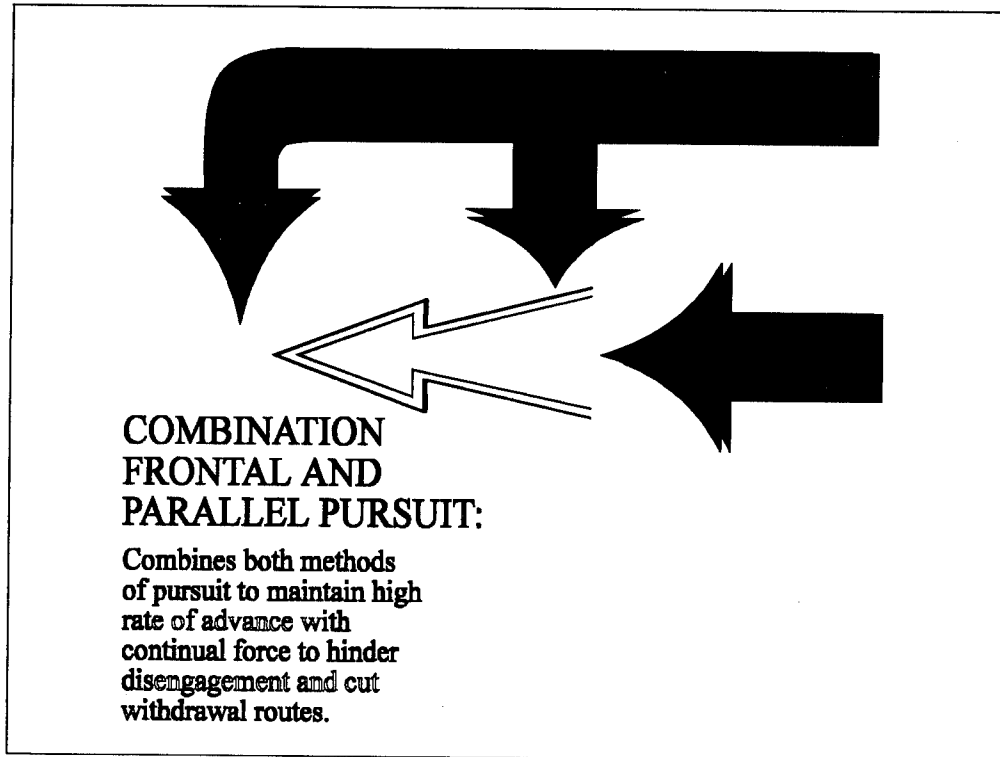


Figure 4-17. Combination pursuit.

Combination

The combination pursuit, which combines the frontal and parallel, hinders disengagement, leads to flank attacks, and cuts the enemy's withdrawal routes. (See Figure 4-17.) The preferred technique is the combination method. Using this variant, a small force pursues the enemy along his withdrawal route, attempting to prevent an orderly withdrawal. At the same time, exploitation forces move along parallel routes and attempt to block the path of the withdrawing enemy. Air assault or airborne forces may also be inserted to block the enemy's withdrawal.

OPERATIONAL CONCEPT AND NORMS

The overall mission of an army offensive is to seize key military, political, and economic centers and concurrently destroy

enemy military forces defending them. Operational objectives may be synonymous with strategic objectives, such as the capital city of a military region, an economic center, or industrial base. The physical dimensions of the army attack depend on the composition and disposition of enemy forces and the terrain in the army attack zone.

Nature of Enemy Defenses

The OPFOR may measure the preparedness of enemy defenses in terms of the preparation time the defenders have had since occupying their defensive positions. At the operational and tactical level, however, preparedness of the defense is also a function of whether or not the enemy has completed deployment of the forces designated to defend in a sector or along a defensive line. A **fully prepared** enemy defense would have forces fully deployed in manned positions, with strong operational reserves capable of

reserves capable of broad maneuver and large counterattacks. A **partially prepared** defense would have a strong covering force deployed, a main defensive area not fully manned in positions only partially prepared, with operational reserves not fully deployed. The **unprepared** defense would have a weak covering force deployed, no preparation of the main defensive area, and few operational reserves. The OPFOR expects to encounter **partially prepared** defenses. Behind the covering force, some of the first-echelon enemy divisions may be fully deployed, while others are not. For example, one of the divisions may have one brigade deployed and the remainder of the division still deploying, perhaps up to 100 km from the forward edge.

Attack Zone Width

Attack zone frontages, like echelonment and mission depths, are determined by the preparedness of the enemy's defenses. The following are general guidelines, based on an expeditionary army with 3 to 4 divisions in its first echelon:

Unprepared Defenses

Against unprepared defenses, the army would probably lead the attack with the army forward detachment to defeat the enemy's covering force, followed the first-echelon divisions and a brigade-sized combined arms reserve. The total army attack zone could range between 40 to 80 km. The army may attack on multiple axes with no obvious main attack. Each first-echelon division would attack on its own axis, with situation-variable spaces between divisions. Attack zones for each of the divisions in the first echelon could range between 8 to 20 km, depending on the echelonment of its subordinate brigades.

Partially Prepared Defenses

Against partially prepared defenses, the army could lead the attack with the army forward detachment (if formed), or hold it until a penetration of the enemy's defenses has been achieved. The first echelon would be composed of either 3 or 4 divisions. The remaining division(s), if any, would be in the second echelon. An army with all its divisions in the first echelon would have a brigade-sized combined arms reserve. The total army attack zone could range between 60 and 100 km. One or two divisions of the first echelon conduct the main attack; the remainder conduct supporting attacks. Attack zones for divisions in the main attack range between 8 and 15 km; supporting attack zones range between 15 and 30 km.

Fully Prepared Defenses

Against fully prepared defenses, the army first echelon would be composed of either two or three divisions. If the army has three divisions in the first echelon, it would have one division in the second echelon. An army with two divisions in the first echelon would have two divisions in the second echelon. The total army attack zone could range between 60 and 100 km. One or two divisions of the first echelon conduct the main attack; the remainder conduct supporting attacks. Attack zones for divisions in the main attack range between 8 and 15 km; supporting attack zones range between 15 and 30 km.

Mission Depths

The depth of offensive operations depends on the nature of enemy defenses. The entire OPFOR military does not necessarily have to be fully mobilized, concen

	IMMEDIATE	SUBSEQUENT	
	Destroy Integrity & Cohesion of	Complete Destruction of	Destroy Integrity & Cohesion of
ARMY	Corps	Corps	Army Group
DIVISION (Day 2-4)	Rear of Division	Rear of Division	Corps
DIVISION (Day 1)	Reserve Bde of Division	Reserve Bde of Division	Rear of Division
BRIGADE	Rear of Brigade	Rear of Brigade	Reserve Brigade
BATTALION	Rear of Battalion	Rear of Battalion	Rear of Brigade

Figure 4-18. Probable mission depths in offensive against extra-regional power with partially prepared defense.

trated and deployed prior to hostilities. It is only necessary that the attacking force complete the process before the enemy has fully deployed his defending force. If the attacker achieves the first strike, he can prevent the creation of prepared defenses. He can probably find gaps or weak spots in the defender's combat formation, and thus use a preemptive attack to generate momentum and engage in operational and tactical maneuver.

In the "worst-case scenario" for the OPFOR, it would have to face an **extra-regional** power which may have modern equipment and large military forces organized into divisions, corps, and even army groups. Such an enemy would be capable of contiguous and in-depth defense. Figure 4-18 illustrates a probable hierarchy of **force-oriented missions** in such a scenario. These mission depths are likely in an offensive against a **partially prepared defense**. If the defenses tend toward being fully prepared (fully occupied) or unprepared (only a deployed enemy covering force), the missions could be a step lower or higher on this ladder. However, this table, and the following paragraphs, describe typical mission depths against a partially prepared defense. For

purposes of continuity, the hierarchy in this figure is the basis for discussion throughout the chapter.

The achievement of an army's mission is the culmination of successive attacks conducted by its divisions. Even an operational offensive must begin with first-echelon divisions of the expeditionary army penetrating the enemy's tactical zone of defense. The task of the first day of the operation may be to penetrate through the covering force and to the rear boundary of the defending first-echelon division (up to 50 km). Successive divisional attacks over the next 2 to 3 days exploit these breaches to complete the destruction of encircled enemy first-echelon divisions and possibly engage a counterattacking corps reserve. During this time, they would also seize important areas that would facilitate operations deeper into the enemy corps rear area. In doing so, they would destroy the integrity and cohesion of the enemy corps. The latter is the **immediate mission of the expeditionary army** and might involve a total depth of 100 to 150 km and a total of 3 to 4 days.

The **army's subsequent mission** is to complete the destruction of the enemy

corps and possibly engage the enemy army group reserve. This might involve an additional 150 to 200 km in another 3 to 4 days. Thus, the total mission depth might be about 250 to 350 km over 6 to 8 days. By accomplishing this mission, the army would destroy the integrity and stability of the enemy's army group.

In the preferred scenario for the OPFOR, it would face only the forces of one of its **regional neighbors**, with a country and military structure similar to its own. Such an enemy would have shallower defenses, with force groupings probably no larger than brigade-size. (If the OPFOR has successfully concealed its own mobilization and deployment or at least concealed or misled the enemy as to its intended main attack axis, the regional enemy would not have had time to mobilize larger forces or to deploy them at the point of attack.) Once the OPFOR breaches this shallow defense, its main objectives would be to capture the district and regional capitals and economic centers the force groupings were defending. Figure 4-19 illustrates a probable hierarchy of **force-oriented missions and political-economic objectives** in such a scenario. Capturing district or region capitals includes gaining control of political and economic

centers. As in Figure 4-18, these mission depths are likely in an offensive against a **partially prepared defense**. If the defenses tend toward being fully prepared (fully occupied) or unprepared (only a deployed enemy covering force), the missions could be a step lower or higher on this ladder. Objective depths cannot be ascertained for this hierarchy as easily, due to the non-linearity of the defense and the irregular placement of probable objectives (i.e., cities, industry).

Rate of Advance

In the advance, the problems of overcoming or bypassing areas of destruction, conflagration, flooding and/or contamination can slow down movement. The average rate of advance for the army is approximately 40 to 60 km per day in normal terrain and 30 to 50 km in mountains or marshy areas intersected by rivers. Thus, an operation extending to a depth of 250 to 350 km could be accomplished in 6 to 8 days. Average rates of advance conceal significant variations. In penetrating prepared defenses with an efficient force density, progress will only be 20 to 30 km per day or even less. While in pursuit or exploitation the rate of advance is expected to reach 60 to 70 km and more per day.

	IMMEDIATE	SUBSEQUENT	
	Destroy Integrity & Cohesion of/Capture	Complete Destruction of/Capture	Destroy Integrity & Cohesion of/Capture
ARMY	Region 2d Echelon or Reserve	Region 2d Echelon or Reserve/Region Capital	Region Capital/ National Capital Defense Forces
DIVISION (Day 2-4)	District Capital	District Capital	Region 2d Echelon or Reserve
DIVISION (Day 1)	District Reserve	District Reserve	District Capital
BRIGADE	Rear of Brigade	Rear of Brigade	Reserve Brigade
BATTALION	Rear of Battalion	Rear of Battalion	Rear of Brigade

Figure 4-19. Probable mission depths/objectives in offensive against regional power with partially prepared defense.

Chapter 5

Defensive Operations

OPFOR military thinkers have studied the defense and defensive operations from both regional and extra-regional perspectives. Since they must consider contingencies ranging from the smallest regional threat to intervention by an extra-regional superpower, their **defensive doctrine** encompasses the **three basic forms** of operations addressed in Chapter 1: **direct, partisan, and combined**. This chapter addresses fundamentals of the defense and provides an overview of the partisan aspect of the People's War concept. The tactics, techniques, and procedures employed by partisan forces are detailed in Chapter 13, Partisan Operations.

ASSUMING THE DEFENSE

Region and army defensive operations are a forced form of combat. Circumstances dictate whether or not the defense is temporary. A region or army generally conducts a defense under the following circumstances:

Invasion

If the State is invaded by a larger military power, either the forces contained within the military region or an army mobilized within the region would defend. Forces are not tied to terrain. Subordinate military districts may defend within the territorial boundaries of their districts, or may defend as part of a larger formation in adjacent districts, depending on the region commander's defensive plan. If invaded by a major power,

the defense is not temporary, but part of a protracted People's War. If large-scale OPFOR offensive actions in another country precipitate the invasion, the defense is in support of those offensive actions.

Stalled Offensive Operations

An expeditionary army conducting extra-territorial offensive operations may assume the defense because of heavy losses caused by high-precision conventional weapons or air attacks, by defeat in a meeting engagement, or by encountering an enemy with superior forces. This defense would be viewed as temporary.

Defensive Mission Components

Depending on the circumstances under which the defense was adopted, the mission of a region or army defensive operation includes some or all of the following:

- Repel an attack or counterattack by superior forces.
- Inflict maximum losses on the enemy.
- Support the development of an attack by an expeditionary army.
- Hold vital lines or areas.
- Restore the combat capabilities of the expeditionary army when it has taken such heavy losses that it cannot continue to attack.

FUNDAMENTALS OF DEFENSE

These general characteristics apply to all OPFOR defenses:

Preparation

The OPFOR arrives in the battle area before the attacker, making the most thorough preparation that time allows. If the defense takes place within the State, much of the preparation would have taken place in peacetime. This preparation includes preliminary engineer work and the establishment of caches near planned defensive positions. Defense of the military regions and subordinate districts figures prominently in peacetime contingency planning at all echelons. In the early stages of battle, the OPFOR capitalizes on the advantage of fighting from positions of its selection, and looks for opportunities to take the initiative from the attacker. The defense always includes a main effort, with positioning of reserves and all support prioritized on that basis. In addition to moving, organizing, positioning, and rehearsing active duty maneuver forces, preparation includes mobilizing reserve and militia forces, and conducting reconnaissance and surveillance operations forward of the main defensive area.

Security

Commanders provide security to protect their forces, through a combination of physical means and deception. Defending units at all echelons attempt to deceive the enemy as to their true disposition. Establishing security zones aids in this deception effort.

Disruption

The OPFOR disrupts the attacker's tempo and synchronization in order to counter his initiative and prevent him from massing the desired combat power. Destroying the integrity of the attack is critical. Keys to this effort are interrupting the at-

tacker's fire support, logistics support, and command and control.

Mass and Concentration

The OPFOR seeks to mass the effects of combat power and shift that mass repeatedly, based on the main effort of his defense. To obtain this firepower advantage, the commander economizes and accepts risks in some areas. He always forms and retains a reserve, normally composed of mobile maneuver forces. In order to gain time to concentrate his forces, the commander may surrender some ground. Disruptive partisan activity is aimed at the enemy's lines of communication and command and control facilities.

Flexibility

Agile execution and flexible planning are prerequisites for a successful OPFOR defense. Although the attacking enemy normally decides the time and place of combat, commanders agile enough to counter or elude the brunt of the enemy main attack can strike back effectively. Flexibility starts with detailed planning, based on a sound understanding of the enemy's intent, and is needed for organizing in depth and constituting reserves. Basic plans gain flexibility through the use of supplementary positions and counterattack plans. Once the commander has determined the enemy's main effort and controls the thrust of this effort, he can operate against exposed flanks, the enemy's rear, and vulnerable logistics and command and control facilities.

FORMS AND TYPES OF DEFENSE

Defensive Forms

OPFOR military art recognizes two primary forms of defensive operations: the **area defense** and the **mobile defense**. Area defenses focus on retention of terrain by absorbing the enemy within an interlocking series of positions and destroying him by fires. Variants of the area defense are practiced at both the operational and tactical levels of war. Mobile defenses focus on destroying the enemy by allowing him to advance into a position which exposes him to counterattack by a large mobile reserve, which comprises the bulk of OPFOR combat power. The mobile defense is practicable at only the operational level of war.

Area Defense

The area defense is the **principle form of OPFOR defense**. It is the defensive pattern most commonly used, regardless of the circumstances under which the defense was adopted. Expeditionary army and military region area defenses, however, differ substantially. These variants are addressed later in more detail. Area defenses are particularly well-suited for use in rough terrain, relatively shallow sectors, or when the OPFOR lacks sufficient maneuver potential compared to the enemy, such as with a pre dominantly light infantry force. When defending against more mobile forces in close-terrain, area defenses are situated to defend on high-speed avenues of approach. Most OPFOR maneuver units deploy to retain ground; they employ positions in depth and maintain mobile reserves. The defense is

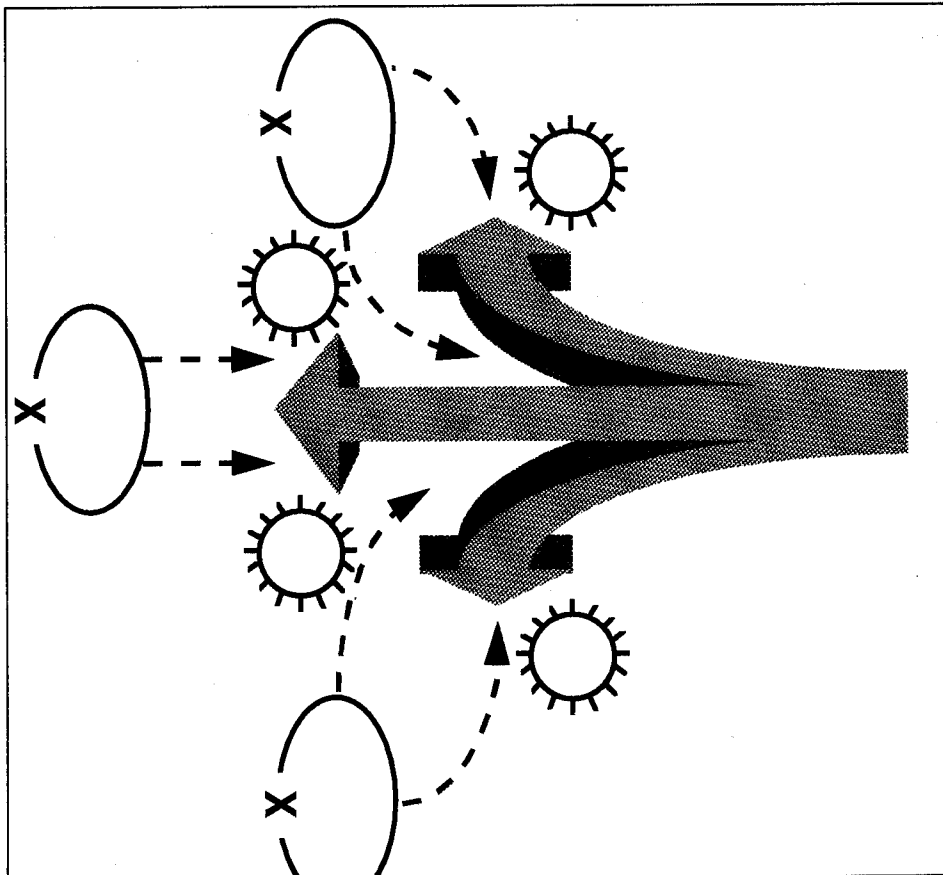


Figure 5-1. Area defense.

or ganized around a relatively static frame work of positions, and seeks to destroy the enemy with interlocking fires (See Figure 5-1.). Local counterattacks are employed against enemy units penetrating between de fensive positions. A security zone is nor mally established as an integral part of the area defense.

Mobile Defense

Although OPFOR military art recog nizes the mobile defense, it would be em ployed only rarely. Most probably, it would be **used only by an expeditionary army**, since this is the only army-sized force with a predominance of mobile formations. OPFOR commanders conduct a mobile de fense to destroy the enemy through a combi nation of offense, defense, and delay to de feat his attack (See Figure 5-2.). The em phasis is on committing the smallest force

possible. The defending force trades terrain for time and diverts the enemy's attention from the main force, which attempts to at tack the enemy on an exposed flank. The mobile defense sets up large-scale counterat tacks that offer the OPFOR commander the opportunity to gain the initiative and transi tion to the offensive.

Types of Defense

Based on the amount of preparation time, the OPFOR characterizes its defenses as either **deliberate** or **hasty**. A deliberate defense is organized whenever the OPFOR has sufficient time to prepare its defensive positions; this preparation of strongpoints and individual fighting positions may take 24 to 48 hours. The hasty defense is adopted when the OPFOR has very little time to or ganize a defense or when its advance forma

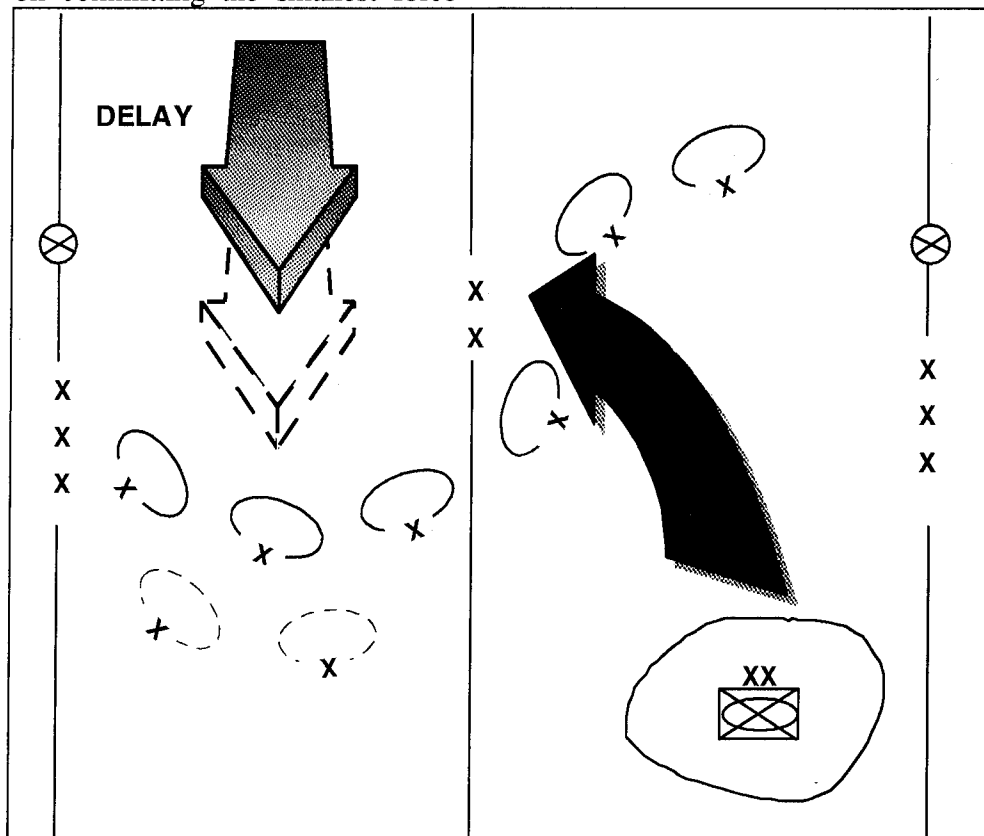


Figure 5-2. Mobile defense.

tions have stopped their offensive action. Tanks are farther back because there is no time for them to dig in. In the hasty defense, the width of the frontage is smaller, with smaller gaps between strongpoints.

OPERATIONAL CONCEPT: MILITARY REGION AREA DEFENSE

A military region is composed of the forces of subordinate military districts, augmented by resources allocated from the General Staff. Subordinate tactical formations are districts, each of which usually contains separate brigades. Districts may have divisions. Reserve units and militia may also be part of the defense. As illustrated in Chapter 2, these structures and their possible combat support and combat service support organizations vary widely. For the sake of illustration, it is assumed that regions and districts have received everything which they could receive during wartime.

The primary role of the region headquarters in a defense of the region is to coordinate, direct, maintain, and sustain its subordinate districts. Although it may have some combat support organizations directly under its control, it does not have the expeditionary army's ability to integrate these forces effectively.

Mission

The primary mission of the region conducting the defense is to protect the territorial integrity of the region and stop the invading enemy from advancing further into the interior of the State.

Scope

The dimensions of the defense depend on the boundaries of the region, its subordinate districts, and the terrain contained within them. For example, if the geographic layout of the region places two subordinate districts along the State's border and one district behind those two, the general frontage of the defense would extend across both forward districts. Across this general line, placement and number of avenues of approach dictate the dispersal of forces. Only rarely would a district have enough forces to conduct a contiguous defense. Districts normally concentrate their forces on the main avenues of approach leading into the State's interior. In mountainous or open terrain, their defensive zones are wider with a greater dispersal of forces. In normal terrain containing a key enemy axis, zones are narrower with larger concentrations of forces.

Formation

The operational formation of the military region may be in one or two echelons with special reserves. Two-echelon deployment occurs under the following general circumstances: when facing a stronger extra-regional force on the most threatened axis, or in restrictive terrain. Single-echelon deployment occurs when facing a weaker regional force, when the geographical layout of districts within the region dictates it, or when the defender has suffered heavy casualties. The operational formation must be deep enough for flexible maneuver by second-echelon and reserve forces, and to reinforce resistance against the enemy's attack.

Linearity

Regions cannot conduct a linear, contiguous defense. This is due to the amount of terrain to be defended and the dispersal of forces, as mentioned above. Across the region's broad main defense line, the most probable deployment is an irregular disposition of brigade-sized concentrations on key terrain along important avenues of approach.

Organization of Defense Lines

The military region organizes its defense along a series of defense lines (See Figure 5-3.). There are three components: the security zone, the main defense line, and the second defense line.

Security Zone

The security zone, at both the operational and tactical levels, is an area in front of the main defense line which is designed to delay, weaken, and deceive the enemy. Creation of a region security zone is an operational decision, made by the region commander. All forces contained within the zone, however, come from subordinate districts and are controlled by subordinate district commanders. Since the region security zone is, in effect, composed of the combined district security zones, composition and missions of forces with the security zone are addressed later under district.

Main Defense Line

The main defense line contains the military region's first echelon, which is composed of the forces within 2 to 3 districts, depending on the geographic layout of the region. For example, if the geographic layout of the region places two subordinate

districts along the State's border and one district behind those two, the main defense line would extend across both districts. **This line, however, would not be linear or continuous.** There will probably be gaps of coverage in the line. Depending upon available forces and terrain, some of these gaps may be significant. Placement and number of avenues of approach within each district, coupled with the enemy's expected main effort, dictates the dispersal of forces and the overall width of the defensive line. Generally, the depth of forces along this line is 10 to 15 km; however, this is largely dependent on the most defensible terrain for the district's forces.

Mission. The primary mission of the main defense line is to stop the enemy's attack and destroy his forces forward of the main defense line. Ideally, the main defense line would:

- Hold terrain vital to the integrity of its defense.
- Prevent penetration of the main defense line by repelling enemy attacks with maximum casualties.
- Support counterattacks by the region's reserve forces or second echelon against this weakened enemy force.

Organization and disposition.

Each of the districts within the main defense line defends with its separate brigades in one or two echelons, supported by its organic or allocated combat support and combat service support. Figure 5-3 illustrates probable deployment within the main defense line. Two-echelon deployment occurs on the most threatened axis or in restrictive terrain. Single-echelon deployment occurs on secondary axes or when defending on a broader frontage. In either case, forces defend battalion- and brigade-sized positions located on

key terrain along the enemy's avenues of approach.

Conduct of the defense. How individual districts defend is addressed separately later in the chapter.

Second Defense Line

Regions normally defend in two echelons. The second defense line contains the region's second echelon, plus any region-level reserves. The second echelon normally makes up one-fourth to one-third of the region's total maneuver strength, depending on whether the region contains three or four subordinate districts. As in the example used earlier, if the geographic layout of the region places two subordinate districts along the State's border and one district behind those two, this rear district's forces would comprise the bulk of the second echelon. Since district size and the most defensible terrain along avenues of approach dictates the placement of the main and second defense lines, there is no standard distance between the two lines. At a minimum, however, it would be 10 to 15 km. Depth of the second defensive line would be approximately 10 km. Figure 5-5 provides an example of unit dispositions in the second defense line.

If the region defends in **one echelon**, it would form a **combined arms reserve**, which would make up roughly one-ninth of the region's total strength. Taken from a district defending a secondary sector, this combined arms reserve would locate within the second defense line. As with forces within the second echelon, this would probably be a separate motorized or mechanized infantry brigade. Under these circumstances, terrain would not be a determining factor in the second line's positioning. It

would be 10 to 15 km behind the main defense line, positioned along the axis of the enemy's expected main attack.

Mission. The **primary** mission of the second defense line is to **contain enemy penetrations** of the main defense line until a counterattack can be launched. This may be a region-level counterattack, conducted by a region reserve, or a strategic counterattack, conducted by the Capital Defense Forces.

A **secondary** mission of the second defense line may be to **reconstitute** the forces of the main defense line should the enemy's main attack sufficiently weaken those positions. Reconstituting the first echelon is the least preferred employment, because it causes forces to abandon prepared positions. Designated forces in the second defense line may also have the mission of destroying enemy air landings.

Composition and disposition. The maneuver forces occupying the second defense line are the most mobile, best-equipped in the region. For a district conducting this mission, this would usually be 3 to 4 separate motorized or mechanized infantry brigades, plus its organic and allocated combat support and combat service support. The second defensive line also contains reserves formed by the region, including antitank, chemical protection, and engineers. A district within the second defense line defends with its separate brigades in one or two echelons. Figure 5-5 illustrates probable deployment within the second defense line. Two-echelon deployment occurs on the most threatened axis or in restrictive terrain. Single-echelon deployment occurs on secondary axes or when defending on a broader frontage. In either case, brigades would be positioned along the most

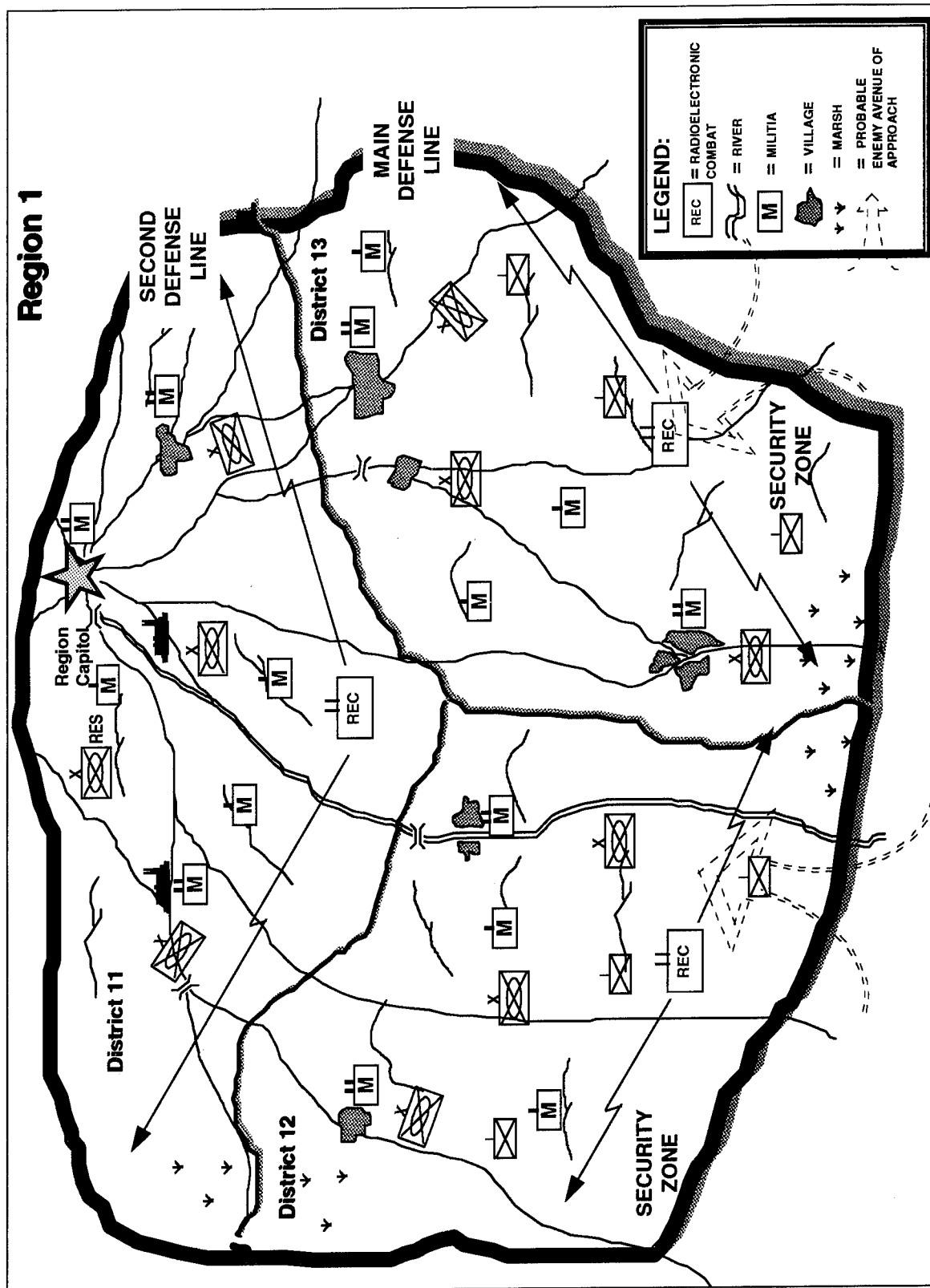


Figure 5-3. Military region defense lines.

threatened approach(es) into the interior of the State.

Conduct of the defense. How districts within the main and second defense lines defend is the same, and is addressed later.

Reconnaissance assets subordinate to the district and its separate brigades operate in and to the flanks of the gap between the main and second defense lines as shown in Figure 5-5, with the same missions as reconnaissance assets operating in the region's security zone. The gap may also contain platoon-sized antitank and air defense ambushes. Militia units, whose towns and villages are encompassed by the gap, may be active in either a reconnaissance role or by conducting harassing and delaying actions. Once bypassed, militia forces blend back into the population or hide and wait for the bulk of the enemy's combat forces to pass. They then conduct partisan-type operations against command and control or logistics facilities moving toward the rear of the enemy's column.

Region Combat Support

The following paragraphs give a brief overview of how assets controlled by the military region support the defensive concept. More comprehensive detailed information on combat support assets and organizations is contained in later chapters, as noted.

Fire Support

Generally, defensive OPFOR fire support is used to--

- Disrupt enemy preparations for the attack.

- Cause maximum attrition to attacking forces before they reach direct fire range.
- Repel attacking forces that reach or penetrate OPFOR defenses.

The following paragraphs outline fire support for the region during the defense. The OPFOR definition of **fire support** includes all combat support actions provided to ground forces by artillery, aviation (fixed and rotary-wing), and naval fires; artillery includes surface-to-surface missiles (SSMs), free rockets over ground (FROGs), multiple rocket launchers, and antitank missiles and artillery. A more detailed, comprehensive discussion for each of the subsets of fire support is in Chapter 6, Fire Support.

Artillery. Depending on its mission, the region may receive additional artillery to form artillery groups at region level, or to allocate to subordinate districts. If formed by the region, the groupings are referred to as military region artillery groups (MRAGs). The MRAGs usually consist of at least two battalions of field guns, howitzers, gun-howitzers, and multiple rocket launchers. Organizations available at the national level which could be allocated to the region include 152-mm artillery brigades composed of guns or gun/howitzers, 122-mm or 220-mm rocket launcher brigades, or the same type of artillery regiment found within districts and standing divisions.

Artillery groups position within the main defense line behind the second echelon, deploying along the primary avenues of approach. If the groups cannot cover more than one sector due to the width of the frontage, they would split into two smaller groups. If employed in a single group under these circumstances, it would be in the sec-

tor where the enemy's main attack is expected.

As in the offense, OPFOR artillery is employed in mass and under centralized control. The primary mission for MRAGs is counterfire. Other missions include reinforcing the artillery of forces defending in the main defense line and targeting the main enemy avenues of approach into OPFOR defensive positions. Their maneuver by fire consists of shifting concentrated fires on new targets as the enemy maneuvers. This provides a high volume of fire against the enemy's more important target groupings and against targets in the enemy's rear area. The five defensive phases of fire which they employ, and subordinate priorities for each, are addressed in Chapter 6, Fire Support.

Antitank. Antitank battalions allocated to the region have three batteries, which are gun, missile, or a combination of the two battery types. The battalion's primary role is as an antitank reserve. Engineer groupings with minelaying capabilities work closely with the antitank reserve. The battalion positions within the second defense line along the expected main axis of the enemy. It is used to screen the deployment of the second echelon or maneuver reserves, secure the flank, or repel enemy armor counterattacks. Secondary missions include reinforcing the antitank defense of the first echelon or countering penetrations of the first echelon in the main defense line.

Air Force. The overall defensive fire plan incorporates the use of Air Force assets. In the fire support role, Air Force assets are viewed as aerial artillery. The region has an air control element as part of the staff. Command and control of Air Force assets at all echelons is addressed in Chapter 7, Air and Air Defense Operations.

Combat support could include fixed-wing fighters or attack helicopters. Priority of support is to the district in whose sector the enemy's main attack is expected. This district, and its subordinate maneuver brigades, normally receive liaison officers from the region's air control element to facilitate support. The primary goal is to disrupt the enemy's attack plans. The aerial fire support plan contains several variations, focusing on the enemy's most probable axes of attack. These variations include strikes against targets that are well out of the range of tube artillery and multiple rocket launchers, as well as strikes against enemy forces which have penetrated forward defensive positions. Each variation includes an aviation counter-preparation plan, which includes the following targets: artillery in firing positions, aviation on its home fields, armor/mechanized forces preparing to attack, command and control centers, and logistics centers.

Navy. Given the size of the OPFOR Navy and the relatively limited scope of its missions, most support would be general in nature and mostly circumstantial. For example, a region's forces defending near the coastline may benefit from the coastal artillery defense system by happenstance, not because of naval assets specifically designated to support its defense. See Chapter 11, Naval Operations and Amphibious Landings.

Air Defense. Military regions normally have an air defense regiment, which is composed of towed gun battalions, self-propelled gun battalions, or a mixture of surface-to-air missile and gun battalions. These regiments generally have the same weapon systems as subordinate districts. Therefore, they can augment air defense systems within the districts, but cannot provide overlapping complementary coverage. Region air de-

fense weapons usually position to the rear of the second defense line to support the region's second echelon, or to the rear of second echelon brigades in the main defense line to engage aircraft which penetrate the air defenses of those districts. If used within the main defense line, priority of coverage is to the sector in which the enemy's main attack is expected. Apart from these primary missions, assets may be used to protect region command posts, establish air ambushes within the undefended area between the main and second defense lines, and overwatch areas where enemy airborne or air assault forces may be employed. See Chapter 7, Air and Air Defense Operations.

Engineer. Most regions have engineer organizations organic during peacetime. Normally, these are combat engineer battalions. Regions can also receive a variety of engineer support from the specialty battalions within the combat engineer brigades at the national level. Basic engineer work in the defense falls into the following general categories: reconnaissance, creation of obstacles, fortifying troop positions, camouflaging larger important

targets, and supporting counterattacks. Most of these missions would be conducted in the main defense line. The region's organic combat engineer battalions would augment engineers organic to first-echelon districts and their subordinate brigades. Since the majority of this type of engineer support would go to the district in whose sector the enemy's main effort is expected, the district commander would exercise control of these forces for the duration of their support. If preparation time and resources permit, these engineers would be used to prepare positions within the security zone, beginning with forward positions and working outward. See Chapter 8, Combat Support Operations.

TACTICAL CONCEPT: MILITARY DISTRICT AREA DEFENSE

Districts defend as part of the region first echelon in the main defense line or as the region second echelon in the second defense line. This section focuses on the security zone and main defense line. Organizational principles and disposition of forces are generally the same for both the main and second defense lines. A military district is usually composed of 3 to 4 separate brigades, augmented by organic and allocated resources. As illustrated in Chapter 2, these structures and their possible combat support and combat service support organizations vary widely. For the sake of illustration, it is assumed that districts have received everything which they could receive during wartime.

Deployment Principles

Command and Control

Commanders normally place their forward command posts behind the center of the first echelon of their district. This is normally behind the first echelon brigade where the enemy's main attack is expected. Commanders at all echelons are expected to conduct personal reconnaissance, when feasible.

Fortified Defense

Each unit, especially those near the frontlines, would establish well dug-in, fortified positions with strongpoints that are capable of 360-degree defense. Minefields and obstacles are constructed, particularly in front of the forward edge of the defense. They are also emplaced throughout the de-

fensive system of the brigade, including the areas between echelons, and are covered by observation and fields of fire. Units establish interlocking fields of fire with adjacent units, as practicable. Mechanized forces and artillery pieces of the first echelon battalions and brigades are normally dug-in; those in the second echelon are more mobile.

Reserve Forces

A mobile reserve is normally retained at **battalion level and above**. It is normally a reinforced unit two levels below the parent unit. A separate brigade, for example, would have a reinforced company as a reserve. The reserve comes from the second-echelon unit, and is preferably mechanized or tank. Battalion- and brigade-level reserves are positioned near the second echelon, although they may be placed behind the first. The division reserve is normally composed of mechanized or tank forces.

Counterattacks

Counterattack plans are made at every level, beginning with company. Although reserves normally are the primary counterattack force, other units may be used, particularly those in the second echelon. The authority of the next higher commander is normally required prior to launching the counterattack.

Antitank Defenses

Each maneuver unit from company to army plans antitank defenses, which include obstacles and mines. If necessary, field guns and air defense artillery weapons are used in an antitank role. Antitank defenses and weapons are located along likely avenues of approach into which the defenders try to canalize the enemy to form kill

zones. Antitank defenses are emplaced from the security zone back through the second defense line, with the majority in the main defense line.

Mission

District missions mirror those of the region defense line of which they are a part, either the main or second defense lines.

Scope

Generally, the overall frontage of a district defending in the main defense line extends across the district. Across this general, irregular line, placement and number of avenues of approach dictate the actual dispersal of forces. Brigades defend on the main avenues of approach leading into the State's interior. Therefore, brigade frontages are more important in determining the scope of the defense. Light and motorized separate infantry brigades normally defend a frontage of 3 to 6 km. Mechanized and tank brigades normally defend a frontage of 10 to 15 km. In mountainous or open terrain, defensive zones are wider with a greater dispersal of forces; in normal terrain containing a key enemy axis, zones are narrower with larger concentrations of forces.

Formation

In either the main or second defense lines, the tactical formation of the military district may be in one or two echelons with special reserves. Two echelon deployment occurs under the following general circumstances: when facing a stronger extra-regional force, on the most threatened axis, or in restrictive terrain. One echelon deployment occurs when facing a weaker regional force, when the geographical layout of districts within the region dictates it, or

when the defender has suffered heavy casualties. The tactical formation will be deep enough for flexible maneuver by second echelon and reserve forces, and to reinforce resistance against the enemy's attack.

Linearity

Generally, districts within the main defense line cannot conduct a linear, contiguous defense for the same reasons stated earlier for the region. A district in the second defense line may have a more linear defense, due to the converging of the avenues of approach leading into the interior of the country and a corresponding concentration of forces along those avenues.

Components of the Defense

The following are components of the district defense within the region's security zone and the main defense line.

Security Zone

The security zone, at both the operational and tactical levels, is an area in front of the main defense which is designed to delay, weaken, and deceive the enemy. Although the creation of a security zone is an operational decision made by the region commander, district commanders control the forces contained within their respective areas of responsibility within the zone. The district security zone frontage would match the frontage for the district's portion of the main defense line. Depth can range out to 50 km or more, but varies based on the enemy and the terrain. Ideally, it extends from the main defense line to the border. Specific activities within the zone fall into two general mission categories: reconnaissance and security. (See Figure 5-4.)

Reconnaissance. District reconnaissance assets come from their reconnaissance and radioelectronic combat (REC) battalions. REC assets are addressed later under the Military District Combat Support heading, since their primary missions do not normally place them in the security zone. The primary ground reconnaissance mission within the security zone is to warn of enemy movements. This includes reporting on the size and location of units, troop concentrations, command and control elements, locations of logistical and reserve elements, and probable main thrusts. The reconnaissance assault company tends to operate from single vehicles or small teams, establishing observation posts on dominant terrain. The reconnaissance companies operate in small patrols of two to three vehicles each along the enemy's expected avenues of approach. District-level reconnaissance responsibilities generally include the forward half of the zone. For example, if the distance from the main defensive line to the forward edge of the security zone was 50 km, district-level reconnaissance would operate in the band from 25 to 50 km forward of the main defense line. Ground reconnaissance assets from the separate brigades in the main defensive line would operate in the band extending from their defense to a depth of 25 km. Based on district reconnaissance reports, brigade reconnaissance adjusts or refocuses its efforts.

Militia forces located in towns or villages along the enemy's avenues of approach may participate either actively or passively in the reconnaissance effort. Their participation may be point observation-type missions conducted at the request of reconnaissance assets operating in the security zone, or simply reporting what they have seen to patrols from the district or separate brigade reconnaissance companies.

Security. All forces conducting security missions within the zone are considered part of the security echelon. The depth to which security echelon forces operate depends on the depth of the security zone, the terrain, and the organization and type of force. Security echelon forces established by the district commander cannot withdraw to subsequent positions or from the security zone without his consent. This degree of control is necessary because the district commander may be controlling multiple units in the zone, and he must consider the effect of moving one unit on the other units operating there. For example, artillery may be positioned forward in the zone to support several units and the movement of one unit may expose and endanger the artillery forces. Under ideal conditions, units selected to conduct security echelon missions would be motorized or mechanized infantry. Forward detachments and combat security are the two primary types of security echelon forces.

When the region commander establishes the security zone, the district commander normally forms one **forward detachment** to fight in the portion of the security zone for which he is responsible. The size of the detachment, which could range from battalion to brigade, depends on the forces he has available to conduct his defense. Ideally, the detachment is a separate motorized or mechanized infantry brigade. These have the needed mobility, robust organic reconnaissance, and organic combat support and combat service support. The district commander takes these forces from one of two sources: the district second echelon or from a brigade defending along a less threatened approach or series of approaches. The district second echelon is the primary source.

The **mission** of the forward detachment is to **delay** the enemy, force him to deploy or attack on unfavorable directions, and determine his grouping and main effort. Collectively, these actions allow for the district's first-echelon brigades to deploy into and prepare positions in the main defense line.

The forward detachment fights in separate **company- or battalion- sized positions** along the enemy's expected avenues of approach. Defensible terrain is the primary consideration for their positioning, which may be at any depth within the zone. Forces are generally concentrated in the brigade sector where the enemy main attack is anticipated. These units conduct a series of delays, withdrawing to subsequent positions when endangered by decisive engagement or encirclement.

In a well-developed security zone, each company or battalion has **multiple fighting positions**: an **initial** position, which is the most forward in the security zone; several **subsequent** positions; and the **forward** position, which is the closest position to units defending in the first echelon. Forward positions are normally up to 5 km forward of forces defending in the first echelon. Distance varies, based on the terrain. The intent of the forward position is to emulate main defensive positions; it should be outside of the enemy's direct fire range. Ideally, all of these positions are prepared by engineers. Much of the engineer work for these positions, especially the forward positions, might be done based on peacetime contingency preparations. When circumstances do not allow for development of a full security zone, forward positions may be the only fighting positions forward of the main defense.

Light infantry units, if operating as part of the security echelon, are not be able to delay in the same manner, and may be given orders to allow the enemy to bypass them and conduct partisan-type operations. Their most likely employment is within prepared forward positions.

Local tactical security is provided by first-echelon brigades. As with the district commander's control of the forward detachment, control of **combat security forces** rests with the commander establishing the force. In the absence of a security zone, or at the direction of the district commander, brigades may man forward positions with a company from the brigade's second-echelon battalion. The district commander may direct this action to facilitate withdrawal of the forward detachment from the security zone. There is no difference between these forward positions and those previously addressed. First-echelon battalions may also establish platoon-sized combat security outposts 3 to 5 km forward of their positions. These outposts have the same missions as forward positions, and are normally established in the absence of occupied forward positions or on secondary avenues of approach when forward positions are manned.

Militia forces in villages or towns encompassed by the security zone conduct normal security echelon missions. The size of the force depends on population of the town. Around large ports and in more populous areas, militia battalions may have the missions to deny resources and control of the population. They may also control lines of communications hubs by strongpointing towns along avenues of approach. Even smaller groups are effective by conducting harassing or delaying actions at chokepoints, such as in restrictive terrain or at bridges. Normally, smaller militia forces

in the security zone wait until major combat formations pass and conduct ambushes or raids against command and control facilities or logistical lines. However, if the invasion occurs before the region can deploy its normal security echelon forces, the militia conducts the above actions to delay the enemy until those forces deploy. Some militia may aid in the disengagement and withdrawal of defending forward detachment subunits.

Main Defense Line

The main defense line constitutes the region's first echelon. It normally contains the combined forces of 2 to 3 districts. Each district defends in one or two echelons, with special reserves.

First echelon. The primary mission of the first echelon is to prevent penetration of the first-echelon defenses, and to repel enemy attacks with maximum casualties. This includes holding vital terrain and supporting counterattacks by second echelon and reserve forces. Once defenses are overcome or the integrity of the defense is shattered, their collective mission becomes one of partisan warfare.

Two or three brigades would compose the district's first echelon. The building block of the defense is the infantry battalion. Each brigade defense is composed of **company and battalion strongpoints** at key points along the enemy's avenues of approach. When possible, company or battalion **strongpoints are linked** until a brigade defensive line is formed, which comprises all maneuver units within the brigade. As time permits, each unit establishes dug-in, camouflaged positions with strongpoints capable of 360-degree defense. Minefields and obstacles are constructed, particularly in front of the forward edge of the defense.

They are also employed throughout the defensive system, and are covered by observation and fields of fire. All units establish obstacles and interlocking fields of fire with adjacent units. Tanks, armored personnel carriers, and artillery pieces of the first-echelon brigades are normally dug-in; those behind the first-echelon brigades are more mobile.

In the gaps between the strongpoints established along the avenues of approach, light infantry companies or battalions may conduct screening missions in difficult terrain or company-sized defenses along less probable avenues of approach through that terrain. Once bypassed, they would revert to partisan-type operations.

If these defending units are bypassed, fragmented, or attrited below unit combat effectiveness levels, they would "go to ground" and conduct partisan-type operations against follow-on forces, command and control facilities, and logistical facilities. Partisan tactics and techniques are detailed in Chapter 13, Partisan Operations.

Militia forces also defend within the territorial scope of the first echelon. Normally, these company- or battalion-sized units would defend villages and town, bridges, passes, or other key areas from static positions. They may defend strongpoints in the gaps between regular maneuver units. However, they would not be integrated into the defensive pattern of maneuver units. Both regular and militia units are usually ordered to engage the enemy decisively and hold at all costs.

Second Echelon. The primary mission of the forces in the district second echelon is to **contain enemy penetrations** of the first echelon until a counterattack can

be launched. It may also be used to reinforce the efforts of the first echelon should the enemy's main attack sufficiently weaken the positions of first-echelon defenders. Reinforcing the first echelon is the least preferred method of employment because it causes forces to abandon prepared positions.

The second echelon, one quarter to one-half of available district strength, is usually a brigade. Preferably, this is a motorized or mechanized brigade. It deploys in either one or two echelons, normally positioned behind the brigade sector in which the enemy's main attack is expected. It may fight as a forward detachment in the district's portion of the security zone prior to taking up these positions.

Combined arms reserves. Even with a second echelon, the district may form a **combined arms reserve**. The reserve will make up roughly **one-ninth** of the district's total maneuver **strength** and would normally be battalion-sized. This is a contingency force. It positions behind the second echelon, on or near the most important or most threatened axis.

Antilanding reserves. Military regions may direct subordinate districts to form antilanding reserves, ranging in size from platoon to battalion. The number created depends on assets available, the territorial location of the defense, the number of probable landing zones within the defensive sector, the location of these landing zones in relationship to key OPFOR facilities and terrain, and the importance placed on protection of these zones against landings. These reserves are located near probable enemy airborne or air assault landing zones, primarily in the region rear area. Forces could be allocated from the regular forces; however, this is a more appropriate mission

for the militia located in towns and villages near probable enemy landing zones.

Military District Combat Support

The following paragraphs give a brief overview of how assets controlled at the district support the defense. More detailed, comprehensive information on the organization, principles of employment, and missions of these assets is contained in later chapters.

Intelligence

REC/Reconnaissance. These assets come from the reconnaissance and REC battalion. Its REC subunits position forward within the main defensive line. REC systems position themselves so that the baseline they establish can focus on the enemy's main effort. They position forward within the main defense line on terrain which provides good line-of-sight (LOS). Radio intercept and direction-finding assets provide some limited targeting for artillery. It is accurate enough, however, for jamming or to cue air or ground force reconnaissance. Radar intercept capabilities primarily target airborne radars. Jamming targets the anticipated enemy main effort. If the security zone provides sufficient depth, any of these assets may deploy initially on high ground in the security zone within the area occupied by the forward detachment. Ground reconnaissance subunits focus on the most probable axes of the enemy main effort within their sector. Districts without this battalion rely on reports from maneuver brigade reconnaissance assets. See Chapter 8, Combat Support.

Other Reconnaissance. Military districts may have an organic commando battalion; these battalions are identical in

composition and mission to the commando battalions within the Special Operations Command. Normally, their wartime and peacetime missions are the same: counterinsurgency missions within State territory. However, they may conduct special reconnaissance and direct-action missions against critical enemy facilities, such as command and control nodes and logistics sites. When conducting special reconnaissance, these teams provide deep targeting data for the district; teams are either squad- or platoon-sized, and they are normally inserted forward of the planned security zone during the transition to the defense. Their use in a special reconnaissance role is relatively rare, given the initial problems of air asset availability for deep insertion. See Chapter 10, Special Operations.

Fire Support

As with regions, defensive OPFOR fire support at district level is used to disrupt enemy preparations for the attack, cause maximum attrition to attacking forces before they reach direct fire range, and repulse attacking forces that reach or penetrate OPFOR defenses.

Artillery. Districts normally have a **regiment** which includes one howitzer battalion and one or two gun-howitzer battalions and a rocket launcher battalion. Depending on its mission, the district may receive **additional artillery** to form artillery groups at its level. District groupings are referred to as military district artillery groups (**MDAGs**). If formed, these artillery groups use the artillery regiment described above as a base. Each MDAG usually consists of at least two battalions of field guns, howitzers, gun-howitzers, or multiple rocket launchers.

The number of MDAGs formed depends on the availability of artillery assets and the frontage over which the defense is conducted. These artillery groups position within the main defense line behind the first-echelon brigades, deploying along the primary avenues of approach. If the groups cannot cover more than one brigade sector due to the width of the frontage, they split into two smaller groups. If employed in a single group under these same circumstances, it is in the brigade sector where the enemy's main attack is expected.

The primary **mission** of the MDAGs is to provide **general support for the district**. This support includes reinforcing the artillery/ mortars of first-echelon maneuver brigades, and targeting the main enemy avenues of approach into defensive positions. The defensive phases of fire which they employ, and subordinate priorities for each, are addressed in Chapter 6, Fire Support.

Antitank. Antitank battalions allocated to the district have three batteries, which are gun, missile, or a combination of the two battery types. The battalion's primary role is an **antitank reserve**. When used in a reserve role, engineer groupings with minelaying capabilities work closely with the reserve. The battalion positions near the second echelon of the defense, along the expected main axis of the enemy. It is used to screen the deployment of the second echelon or maneuver reserves, secure the flank, or repel enemy armor counterattacks. Secondary missions include reinforcing the antitank defense of the first echelon or countering penetrations of the first echelon in the main defense line.

Air Force. The overall district defensive fire plan incorporates the use of Air Force assets. Most districts have an Air

Force control element as part of the staff, even in peacetime. Brigades receive air liaison officers from this element during wartime, based on mission and the probability of receiving air support. Command and control of Air Force assets at all echelons is addressed in Chapter 7, Air and Air Defense Operations. Combat support could include **fixed-wing fighters or attack helicopters**. Goals, missions, and priority of support at this echelon mirror those at region level.

Air Defense

Districts normally receive an air defense regiment, which could be composed of towed gun battalions, self-propelled gun battalions, or a mixture of surface-to-air missile and gun battalions. Weapons position to the rear of defending first-echelon maneuver brigades to engage aircraft which penetrate the air defenses of those units. Their positioning along probable enemy air avenues of approach is controlled by the regimental commander, based on the district commander's guidance. Air defense ambushes may also be established along probable air avenues in gaps between brigade defensive positions. Just as with the discussion of region air defense, when the district is defending within the State, it may receive some coverage from national air defense assets stationed within the parent region and controlled by the Air Defense Command. See Chapter 7, Air and Air Defense Operations.

Engineer

Military districts, in peacetime, have organic engineer capabilities ranging from company to battalion. Depending on the enemy's anticipated main effort and the availability or organic engineer resources at the region level, they could receive more sup-

port. Their engineer work in the defense falls into the general categories previously covered. Since the majority of district engineer support goes to the first-echelon maneuver brigades where the enemy's main effort is expected, these maneuver brigade commanders exercise control of these forces for the duration of their support. If time and resources permit, these engineers are used to prepare positions within the security zone, beginning with the forward position. See Chapter 8, Combat Support.

OPERATIONAL CONCEPT: EXPEDITIONARY ARMY AREA DEFENSE

An expeditionary army is composed of the forces of subordinate divisions and separate brigades, augmented by resources allocated from the General Staff. How the army mobilizes is covered in Chapter 4, Offensive Operations. Unlike the region, which primarily coordinates and sustains battles fought by subordinate districts, the expeditionary army fights more like a traditional army. It fights an operational fight with assets under its control. However, region and expeditionary army defenses are similar in many respects. The following paragraphs address only the differences between the two.

Missions

The expeditionary army's missions are to:

- Inflict heavy losses on the enemy's main grouping as it approaches and deploys to attack.
- Repel the enemy attack and hold vital ground.

- Destroy any enemy grouping penetrating through the depth of the defense.
- Create conditions for a transition to the offensive.

Scope

An expeditionary army is normally composed of 3 to 5 mobile divisions, and may have separate brigades under army control. It defends a sector from 90 to 150 km wide and from 100 to over 150 km deep on a primary avenue of approach. Only mechanized forces are capable of achieving the distances on the extreme end of this spectrum. Much depends on the composition of the opposing armies and on the terrain in the sector.

Formations

The operational formation of the expeditionary army is in one or two echelons with special reserves. Rationale for echelonment is the same as for the region defense.

Linearity

Unlike the region, the expeditionary army is designed to conduct a coherent, contiguous defense. Linearity depends on the circumstances under which this defense is adopted. If the divisions are dispersed in a linear fashion before the transition to defense, they would continue to be linear in the defense.

Organization of Defense Belts

The expeditionary army organizes its defense into a series of defense belts. There are **three components**: the security zone,

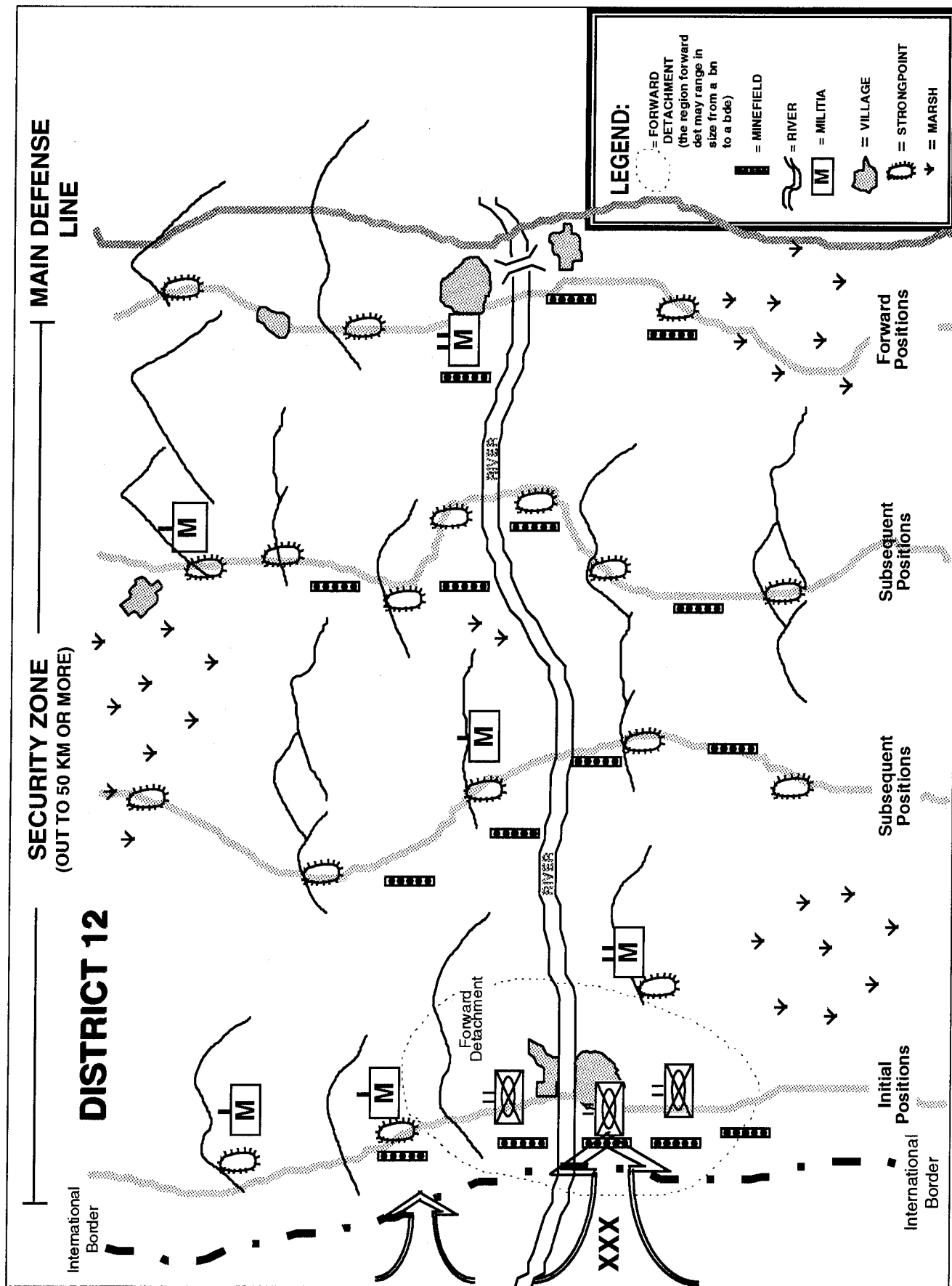


Figure 5-4. Military district security zone along the enemy main avenue of attack.

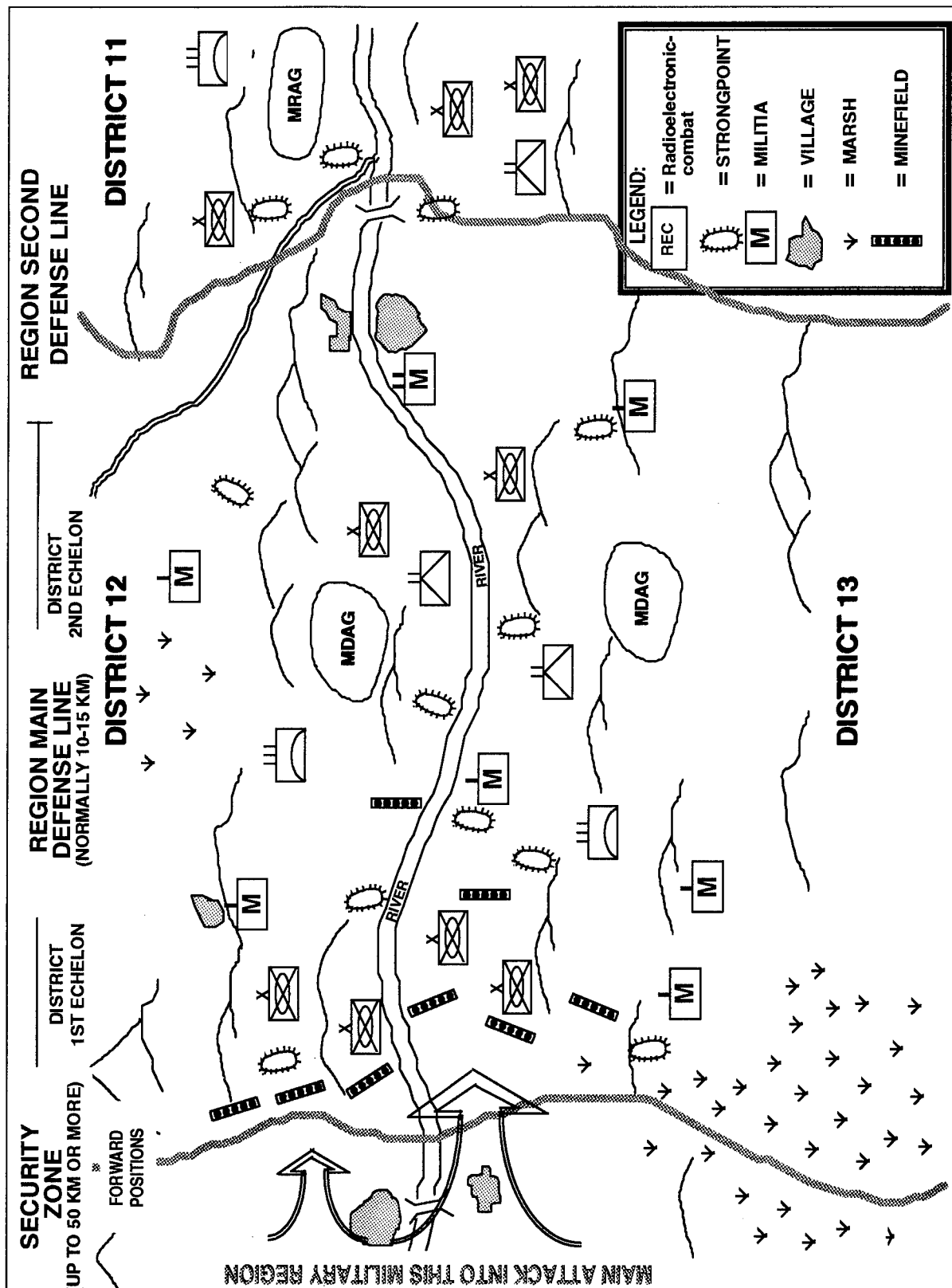


Figure 5-5. Military district main and regional second defense lines.

the **main defense belt**, and the **second defense belt**. Belts differ from the defensive lines used in the region defense. Creation of a belt connotes that strongpoints have been linked across multiple defensive areas. The linearity of the army defense allows this, whereas the region defense does not.

Security Zone

The security zone, at both the operational and tactical levels, is an area in front of the main defense which is designed to delay, weaken, and deceive the enemy. A security zone is always established in front of the main defense line. Although the creation of a security zone is an operational decision made by the army commander, division commanders control the forces contained within their respective areas of responsibility within the zone. The division security zone frontage would match the frontage for the division's portion of the main defense line. Depth can range out to 50 km or more, but varies based on the enemy and the terrain. Ideally, it extends from the main defense line to the border. Specific activities within the zone fall into two general mission **categories**: **reconnaissance** and **security**.

Reconnaissance. Army reconnaissance assets come from their reconnaissance and REC battalions. REC assets are addressed later, since their primary missions do not normally place them in the security zone. As with all ground reconnaissance, their primary mission within the security zone is to **warn of enemy movements**. This includes reporting on the size and location of units, troop concentrations, command and control elements, locations of logistical and reserve elements, and probable main thrusts. The reconnaissance assault company tends to operate from single vehicles or small

teams, establishing observation posts on dominant terrain. The reconnaissance companies operate in small patrols of two to three vehicles each along the enemy's expected avenues of approach. Army-level reconnaissance is generally conducted at the extreme edge of the zone and forward of the zone. For example, if the distance from the main defense belt to the edge of the security zone is 50 kilometers, division and brigade reconnaissance operate in the 25 to 50 km and 0 to 25 km bands, respectively. Based on army-level reports, division and brigade reconnaissance would adjust or refocus their efforts.

Security. As with the region security zone, all forces conducting security missions within the zone are considered part of the security echelon. The depth to which security echelon forces operate depends on the depth of the security zone, the terrain, and the organization and type of force. Shallower security zones are more common with the expeditionary army, given the relative positioning of the enemy and the expeditionary army at the time the defense was adopted. Security echelon forces established by the army commander cannot withdraw to subsequent positions or from the security zone without his consent. This degree of control is necessary because the army commander may be controlling multiple units in the zone, and he must consider the effect of moving one unit on the other units operating there. For example, artillery may be positioned forward in the zone to support several units and the movement of one unit may expose and endanger the artillery forces. Forward detachments and combat security are the two primary types of security echelon forces.

When the army commander establishes the security zone, he may form either

one or two **forward detachments**. The depth of the security zone and frontage of the army are the primary factors determining this. The army forward detachment is normally a separate motorized or mechanized infantry brigade. These have the needed mobility, robust organic reconnaissance, and organic combat support and combat service support. The army commander takes these forces from one of two sources: the army second echelon, located in the second defense belt, or from a division defending in the main defense belt. In taken from a division in the main defense belt, it could either be from a division defending in a less threatened sector or from a division's second echelon. The army second echelon is the primary source.

The mission of the forward detachment is to **delay the enemy, force him to deploy or attack** on unfavorable directions, and **determine his grouping and main effort**. Collectively, these actions allow for the army's first-echelon divisions to continue preparations of positions in the main defense belt.

The forward detachment normally fights in **battalion-sized positions** along the enemy's expected avenues of approach. It may fight as a brigade, depending on the terrain and the importance of the avenue. Defensible terrain is the primary consideration for their positioning, which may be at any depth within the zone. Forces are generally concentrated in the division sector where the enemy main attack is anticipated. These units conduct a series of delays, withdrawing to subsequent positions when endangered by decisive engagement or encirclement.

In a well-developed security zone, each unit has **multiple fighting positions**:

an **initial** position, which is the most forward in the security zone; several **subsequent** positions; and the **forward** position, which is the closest position to units defending in the main defense belt. Forward positions are normally up to 5 km forward of forces defending in the first echelon. Distance varies, based on the terrain. The intent of the forward position is to emulate main defensive positions; it should be outside of the enemy's direct fire range. Ideally, all of these positions are prepared by engineers. When circumstances do not allow for development of a full security zone, forward positions may be the only fighting positions forward of the main defense.

Local tactical security is provided by first-echelon brigades. As with the army commander's control of the forward detachment, control of **combat security** forces rests with the commander establishing the force. In the absence of a security zone, or at the direction of the division commander, brigades may man forward positions with a company from the brigade's second-echelon battalion. The division commander may direct this action to facilitate withdrawal of the forward detachment from the security zone. There is no difference between these forward positions and those previously addressed. First-echelon battalions may also establish platoon-sized combat security outposts 3 to 5 km forward of their positions. These outposts have the same missions as forward positions, and are normally established in the absence of occupied forward positions or on secondary avenues of approach when forward positions are manned.

Main Defense Line

The main defense belt contains the expeditionary **army's first echelon**, which is composed of approximately two-thirds of

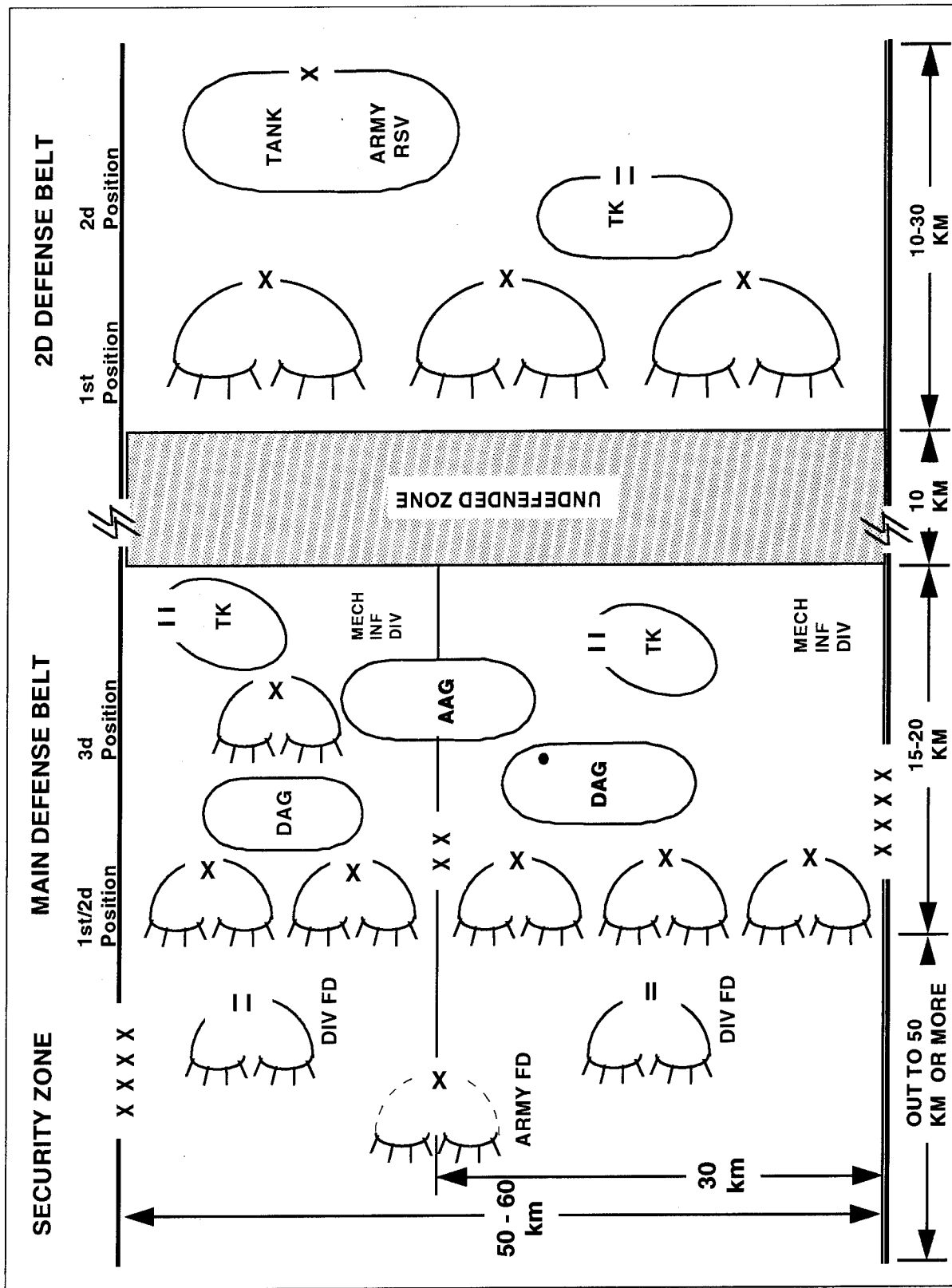


Figure 5-6. Expeditionary army defense (variant).

the army's combat power. It contains the forces needed to conduct the defense, including tank, artillery, antitank, and air defense units, as well as the command posts established by each of the formations. The main defense area relies on **defense in depth**. The basic element is the **prepared battalion strongpoint**. The OPFOR links strongpoints together until they form a defensive area. This occurs at every level. The linking forms multiple areas, or belts, at the operational level.

Scope. The dimensions of the main defense belt depend on the base organization of the force, echelonment within divisions, and the terrain. Generally, the frontage of the main defense belt would be 90 to 150 km. The main defense belt may be from 20 to 30 km deep. These figures reflect frontages of an army composed of mechanized forces.

Mission. The primary mission of the main defense belt is to prevent penetration of the army's first echelon by enemy forces. This includes holding vital terrain, and supporting counterattacks by army second echelon and reserves.

Organization. Each of the divisions within the main defense belt defends in one or two echelons. Figure 5-6 illustrates probable deployment within the main defense belt. How these divisions defend individually is discussed later in the chapter.

Conduct. The battle in the main defense belt is conducted by divisions and their subordinate brigades, battalions, and companies. The key to the main defense belt is the establishment of battalion-sized strongpoints. For mechanized battalions, these are 3 to 5 km wide. They are located at key terrain along avenues of approach and are

completely prepared. They are dug in with minefields, obstacles, and barriers. All strongpoints are covered by fire. These strongpoints are linked to together to form the defensive area.

Second Defense Belt

Expeditionary armies normally defend in two echelons. The second defense belt contains the bulk of the expeditionary army's **second echelon**. It is normally the most mobile, best equipped division the army. Usually, this is a mechanized infantry division. The second defense belt is located 10 to 15 km behind the rear boundary of the main defense belt. Frontage of the belt itself equals that of the expeditionary army, although the forces contained within the belt actually occupies or defends a much narrower frontage. Belt depth is 10 km.

Mission. The mission of the forces in the second defense belt is to **contain enemy penetrations** of the main defense belt until a counterattack can be launched. A secondary mission may be to reinforce the efforts of the main defense belt should the enemy's main attack sufficiently weaken the positions of first-echelon defenders. Reinforcing the first echelon is the least preferred method of employment, because it causes forces to abandon prepared positions. Designated forces in the second defense belt may also have the mission of destroying enemy air insertions.

Composition and disposition. The second echelon normally makes up one-fourth to one-third of the army's total maneuver strength, depending on whether the army contains three or four subordinate divisions. This would equate to three or four divisional mechanized infantry brigades, along with their organic and allocated com-

bat support and combat service support. This formation normally deploys its brigades in a single echelon, positioned either centrally within the second defense belt or along the most threatened approach. The belt also contains reserves formed by the army, including antitank, chemical protection, and engineers. Reconnaissance assets organic to the division acting as the second echelon operate in and to the flanks of the gap between the main and second defense belts. These reconnaissance assets have the same missions as the reconnaissance assets operating in the security zone. The gap may also contain antitank and air defense ambushes.

Expeditionary Army Combat Support

The following paragraphs give a brief overview of how assets controlled by or allocated to the army support the defensive concept. Since many of the organizations, missions, and support provided mirror that provided to the region, only the differences are addressed here. More comprehensive detailed information on these assets is contained in later chapters, as noted.

REC/Reconnaissance

These assets come from the army's reconnaissance and REC battalion. REC systems position themselves so that the baseline they establish can focus on the enemy's main effort. They position forward within the main defense belt on terrain which provides good line-of-sight (LOS). Radio intercept and direction-finding assets provide some limited targeting for artillery. It is accurate enough, however, for jamming or to cue air or ground force reconnaissance. Radar intercept capabilities primarily target airborne radars. Jamming targets the anticipated enemy main effort. If the security

zone provides sufficient depth, any of these assets may deploy initially on high ground in the security zone within the area occupied by the army's forward detachment. Battalion ground reconnaissance subunits operate to the depth of the security zone, focusing on the most probable axes of the enemy main effort. Their reports allow division assets to refocus their reconnaissance efforts. See Chapter 8, Combat Support Operations.

Fire Support

Artillery. **Allocation** follows the same methodology as for the region. Army groupings are referred to as **army artillery groups (AAGs)**. If formed, these artillery groups usually consist of at least two battalions of field guns, howitzers, gun-howitzers, and multiple rocket launchers.

Artillery groups position within the main defense belt behind the division's second echelon. They deploy along the primary avenues of approach. If the groups cannot cover more than one sector due to the width of the frontage, they would split into two smaller groups. Due to the relative linearity of the army's defense, AAGs can provide better coverage than MRAGs. If employed in a single group under these same circumstances, it would be in the sector where the enemy's main attack is expected.

AAG missions are the same as for MRAGs. The five defensive phases of fire which they employ, and subordinate priorities for each, are addressed in Chapter 6, Fire Support.

Antitank. Antitank organizations and missions are the same as for the region. The battalion positions within the second defense belt along the expected main axis of the enemy.

Air Force. The overall defensive fire plan incorporates the use of Air Force assets. Like the region, the army has an Air Force control element as part of the staff. Command and control of Air Force assets at all echelons is addressed in Chapter 7, Air and Air Defense Operations. Combat support could include **fixed-wing fighters** or **attack helicopters**. Priority of support is the same as for the region.

Navy. Naval support here has the same limitations as support for the region. See Chapter 12, Naval Operations and Amphibious Landings.

Air Defense

Army air defense organizations and their missions mirror those of the region. Weapons usually position to the rear of the second defense belt to support the army's second echelon, or to the rear of defending divisions in the main defense belt to engage aircraft which penetrate the air defenses of those divisions. See Chapter 7, Air and Air Defense Operations.

Engineer

Armies normally receive at least one engineer battalion during mobilization. Engineer work in the defense falls into the same general categories previously covered. Most of these missions would be conducted in the main defense belt, augmenting engineers organic to first-echelon divisions and their subordinate brigades. Priorities of work are the same as for the region.

Due to its mission, the expeditionary army is more likely to receive specialty battalions from the national level. These could include obstacle and obstacle clearing battalions from the combat engineer brigades, or

pontoon bridge battalions from either the combat engineer brigade or pontoon bridge regiment. See Chapter 8, Combat Support Operations.

TACTICAL CONCEPT: DIVISION AREA DEFENSE

Divisions defend as part of the army's first echelon in the main defense belt or as the army's second echelon in the second defense belt. Their units may also fight in the security zone as part of the security echelon. This section focuses on the fundamentals of how divisions defend within the security zone and main defense belt. Divisions follow the same general deployment guidelines covered previously.

The division defensive sector is organized into two echelons. The first-echelon brigades form along a defensive line and comprise the main defensive belt. The first-echelon brigades, mission is to stop the enemy in front of the forward positions. The division allocates about two-thirds of its combat power to its first echelon. The second echelon (about one-third of the available strength) has the mission to destroy or repel any penetration of the main belt.

The defense in both echelons is built upon **company-sized strongpoints** unified into **battalion defensive areas**. Strongpoints are planned for all-around defense and sited so deliberate pre-registered gaps exist between them.

Divisions fight in a **security zone** in front of their defensive sector when defending out of direct contact. Reinforced battalions taken from the second-echelon brigades are designated **forward detachments**. These establish a series of reinforced company-sized strongpoints sited on enemy

main avenues of approach. These security zone strongpoints are to delay, disrupt and destroy advancing enemy units. Battalions deploy **combat security outposts** (platoon strength) in the security zone forward of their sectors.

The division would form a combined arms reserve as the commander's contingency force. A mechanized infantry division would also hold its antitank battalion as an antitank reserve to block penetrations of the first echelon and support the counterattack with fire. It would be employed along with an engineer mobile obstacle detachment.

The fire plan is based on antitank fires and integrates ATGM, antitank gun, tank, helicopter, infantry combat vehicles, and indirect and direct artillery fires on accessible terrain in front of and between the first-echelon strongpoints and into kill zones throughout the defensive sector.

Missions

The primary **mission** of a division defending in the main defense belt is to **prevent penetration of the main defense** by repelling enemy assaults. Secondary missions include some or all of the following: hold vital lines or areas, support the development of an attack by an expeditionary army, restore the combat capabilities of the division when it has taken such heavy losses that it cannot continue to attack.

Scope

Divisions defending within an expeditionary army defense tend to conduct a more linear defense, due to the relative concentration of forces at the time the division transitions to the defense from the offense. A division composed of three motorized in-

fantry brigades defends a sector from 6 to 12 km wide and 8 to 10 km deep. A division composed of mechanized or tank brigades defends a sector from 20 to 30 km wide and 15 to 20 km deep. Exact dimensions depend on the mix of motorized and mechanized divisions, as well as the echelonment within each of the divisions.

Formations

The tactical formation of the division is in one or two echelons with special reserves. Two-echelon deployment is usual on the most threatened axis and a one echelon deployment is more appropriate to secondary axes. Single-echelon formations are also adopted when the defender has suffered heavy casualties. Normally, the tactical formation must be deep enough to allow for flexible maneuver, especially of second echelon and reserve forces, and to reinforce the resistance against the main thrust of the enemy's attack. Terrain differences have a constant effect on divisions. In mountainous regions, nonlinear area defenses are more prevalent, because the probable enemy avenues within this terrain allows for the creation of strongpoints at key points along enemy avenues of approach. In restrictive or compartmented terrain, frontages expand. In normal terrain containing a key enemy axis, sectors are narrower.

Components of the Defense

The following are components of the division defense within the security zone and the main defense belt.

Security Zone

Normally, a security zone is established by the army **in front of the main de-**

fense belt. It would not have the same depth as the security zone established in the defense of a region. Depth depends on the relative positioning of OPFOR and enemy forces at the time the defense is adopted. It should be noted, however, that if the army does not establish a security zone, the division may establish one and perform reconnaissance and security echelon missions with organic resources. In this case, missions and responsibilities would mirror those for the districts.

Main Defense Belt

The main defense belt constitutes **the army's first echelon**. It contains approximately two-thirds of the army's combat power. Each of these divisions defends in one or two echelons, with special reserves.

The **dimensions** of the defense depend on the base organization of the force, echelonment within the division, and the qualities of the terrain. A division composed of three motorized infantry brigades defends a sector from 6 to 12 km wide and 8 to 10 km deep. A division composed of mechanized or tank brigades defends a sector from 20 to 30 km wide and 15 to 20 km deep.

First echelon. The mission of the **division's first echelon** includes **preventing penetration** of the first echelon by repelling enemy attacks. Failing that, they hold vital terrain and support counterattacks by second echelon and reserve forces.

Two or three brigades compose the division's first echelon. Each of the divisions within the main defense belt defends with its **brigades in one or two echelons**, supported by their organic or allocated combat support and combat service support.

Figure 5-7 illustrates probable deployment within the main defense line. Two-echelon deployment occurs on the most threatened axis or in restrictive terrain. Single-echelon deployment occurs on secondary axes or when defending on a broader frontage. The building block of the defense is the infantry battalion, composed of either **company or battalion strongpoints**.

Second echelon. The primary mission of the division's second echelon is to **contain enemy penetrations** of the first echelon until a counterattack can be launched. A secondary mission may be to reinforce the efforts of the first echelon should the enemy's main attack sufficiently weaken the positions of first-echelon defenders. Reinforcing the first echelon is the least preferred method of employment, because it causes forces to abandon prepared positions.

The **second echelon**, normally about one-third of the division's available strength, is **usually a motorized or mechanized brigade**. It deploys in a single echelon, either centrally behind the first echelon or behind the sector in which the enemy's main attack is expected.

Combined arms reserves. Even if a second echelon is created, the division may form a **combined arms reserve**. This reserve would make up roughly one-ninth of the division's total maneuver strength. This is a **contingency** force. It positions behind the second echelon, on or near the most important or most threatened direction. Some standing divisions have a tank battalion which may be used as the division reserve.

Antilanding reserves. Armies may direct divisions to form **antilanding reserves**, ranging in size from platoon to bat-

talion. The number created depends on assets available, the territorial location of the defense, the number of probable landing zones within the defensive sector, the location of these landing zones in relationship to key OPFOR facilities and terrain, and the importance placed on protection of these zones against landings. These reserves are **located near probable enemy airborne or air assault landing zones**, primarily in the army rear area.

Division Combat Support

The following paragraphs give a brief overview of how assets controlled by the division supports the defense. Since much of the organizations and missions are common at both the district and division levels, the following paragraphs highlight only the differences. More detailed, comprehensive information on the organization, principles of employment, and missions of these assets is contained in later chapters.

REC/Reconnaissance

These assets come from the reconnaissance and REC battalion. Its REC subunits position forward within the main defensive belt. Capabilities, missions, and priorities mirror those for the battalions at district level. Ground reconnaissance subunits focus on the most probable axes of the enemy main effort within their sector, as refined based on reports from army reconnaissance assets. See Chapter 8, Combat Support.

Fire Support

As with the district, defensive OPFOR fire support at division level is used to disrupt enemy preparations for the attack,

cause maximum attrition to attacking forces before they reach direct fire range, and repel attacking forces that reach or penetrate OPFOR defenses.

Artillery. Artillery regiments organic to a division normally include one howitzer battalion and one or two gun-howitzer battalions and a rocket launcher battalion. **Allocation** methodology is the same as for the district. For divisions, the groupings formed are referred to as **division artillery groups (DAGs)**. If formed, these artillery groups use the artillery regiment described above as a base. Each DAG usually consists of at least two battalions of field guns, howitzers, gun-howitzers, or multiple rocket launchers.

The **number** of **DAGs** formed depends on the availability of artillery assets and the frontage over which the defense is conducted. These artillery groups position within the main defense belt behind the first-echelon brigades. They deploy along the primary avenues of approach. If the groups cannot cover more than one brigade sector due to the width of the frontage, they split into two smaller groups. If employed in a single group under these same circumstances, it is in the brigade sector where the enemy's main attack is expected.

The missions for the DAG are the same as for the MDAG in the military district. The defensive phases of fire employed, and subordinate priorities, are addressed in Chapter 6, Fire Support.

Antitank. Organizations and missions are the same as for the district. See Chapter 6, Fire Support.

Air Force. Organizations, missions, priorities, and liaison functions are the same

NOTES:

1. Main defensive area is organized into two echelons and a reserve:
 - First echelon inflicts enemy losses, forcing him to concentrate and canalize him into kill zones.
 - Second echelon mission is to destroy enemy or reinforce/replace first echelon.
2. In a mechanized infantry division, a tank battalion acts as the main counterattack force.
3. Units in the security zone come from division second echelon forces.
4. Detailed and coordinated fire plan is developed for fire support.

LEGEND:

- PRELANNED ARTILLERY CONCENTRATION
- KILL ZONE
- MIXED MINEFIELD (ANTI-PERSONNEL AND ANTI-TANK)
- BARRIER
- PROBABLE ENEMY AVENUE OF APPROACH

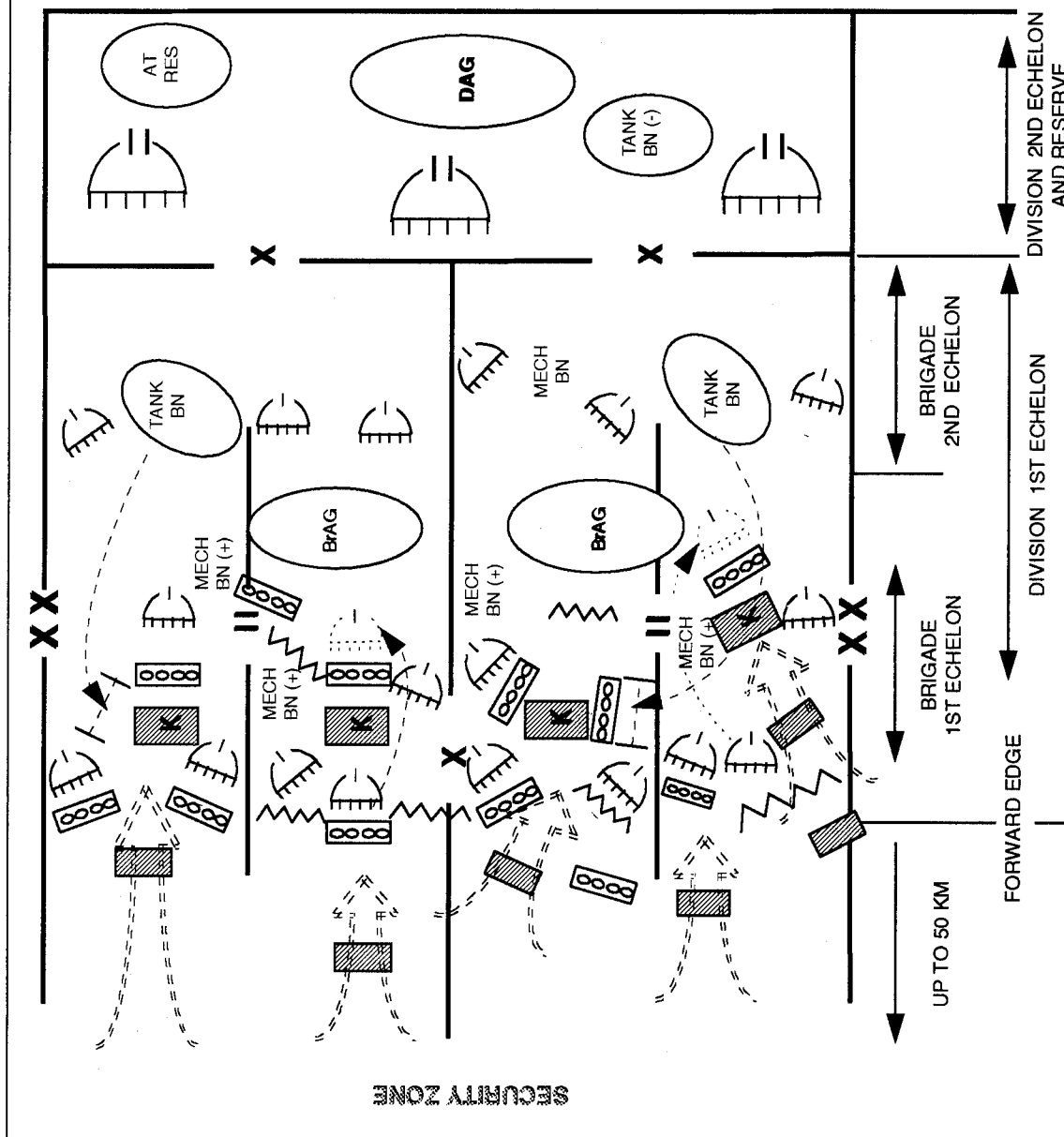


Figure 5-7. Mechanized infantry division in the defense (variant).

as for the district. See Chapter 7, Air and Air Defense Operations.

Air Defense. Organizations, missions, and priorities are the same as for the district. Weapons position to the rear of defending first-echelon maneuver brigades to engage aircraft which penetrate the air defenses of those units. See Chapter 7, Air and Air Defense Operations.

Engineer. Divisions, in peacetime, have organic engineer capabilities ranging from company to battalion. Depending on the enemy's anticipated main effort and the availability or organic engineer resources at the army level, they could receive more support. Missions and priorities are the same as for the district. See Chapter 8, Combat Support.

EXPEDITIONARY ARMY COUNTERATTACK

The expeditionary army counterattack against forces penetrating into the depth of the defense is usually the **decisive move of the defense**, regaining the initiative from the attacker (See Figure 5-8.). Ideally, the destruction of the penetration creates favorable conditions for going over to the offensive. When conditions are less favorable, however, the army counterattack may be mounted with more limited aims, e.g., the destruction of the most threatening grouping penetrating the defense or the restoration of the defense on a favorable line. Where the enemy penetrates the army on several axes in superior strength (especially if he has launched airborne landings which must be countered), the army's response may be limited to counter-penetration to restore the stability of the defense. Other counterattacks are to divert enemy forces from the main axis, and to force the enemy to re-

group. The timing and axes of a counterattacks are crucial, though of the two, timing is perhaps the most important.

Timing

The counterattack should be launched before the firmness and sustainability of the first echelon's defense are compromised, when the enemy has taken heavy losses and has been slowed down or even stopped, but before he has consolidated his gains. Especially favorable moments within this general prescription are when the enemy is relocating his artillery, and/or when he has exhausted his immediate operational reserves, and while deeper reserves are still too far away or are delayed by air attack. The expeditionary army commander faces an exceptionally difficult problem with the timing of his counterattack. The time the second echelon requires to move from a location 60 to 80 km from the forward edge of the defensive area and deploy, combined with the time to issue and react to orders, may be on the order of 7 to 9 hours minimum.

Axes

The **axis** of the counterattack is determined by the aim, by the terrain, and by the time taken to achieve a concentration on one axis rather than another. **Normally**, it is mounted **against one or both flanks** of the enemy penetration as the most likely way quickly to cut off spearheads from their reinforcements, attack enemy high-precision weapons and CPs, and split up and destroy his forces piecemeal. However, head-on attacks to split the enemy are not excluded. They may be dictated by the terrain, or the lack of time to move forces to a flank. Or they may be dependent on when it would achieve surprise, or when it was necessary to

re-establish the defense on a specific favorable line. Whichever axis is chosen, routes to the line of departure and deployment lines must have been chosen and prepared in advance, and lines to cover them should be firmly held.

To achieve this, the army second echelon (reserve) can be reinforced by forces of the first echelon on the axis of the counterattack and, after regrouping, by other first-echelon elements drawn from sectors not under heavy pressure. The counterattack must be preceded by powerful artillery and air strikes. The bulk of the army-level artillery would be combined to this end with that of the second-echelon division and as much of the first echelon's as can be brought to bear. This is also the time for the maximum commitment of air support, with the especially important task of isolating the penetrating enemy force and delaying the forward move of reserves.

WITHDRAWAL

The OPFOR views the withdrawal as a combat action designed to disengage the expeditionary army from attack by superior enemy forces. Regions and districts defending within the State, as covered earlier, transition to the People's War and partisan warfare. They would not conduct a withdrawal. There may be circumstances, however, in which the expeditionary army would conduct a withdrawal. Given that the OPFOR is the strongest military power in its region of the world, this would almost certainly occur when facing a larger, extra-regional power.

The commander's withdrawal order is detailed and includes the mission, routes, formation to be used, delay positions, control measures, and information on the new

defensive position. Withdrawals are organized and executed under strict secrecy and security.

Mission

The mission is to disengage the force in a timely, organized manner without losing its combat capability. figure 5-9 illustrates the basic concept.

Components

The force executing the withdrawal is divided into three groups:

- Covering force.
- Rear guard.
- Main body.

Covering Force

The covering force has the mission to deceive the enemy and cover the initial withdrawal of the main body. This element normally comes from units along the forward edge of the defense, and equates to approximately one-third of the defending unit's combat power. For example, each company would designate one reinforced platoon for this mission.

Rear Guard

The rear guard covers movement of the main body and fights a delaying action if the enemy attempts to maintain contact during the pursuit. It is organized to fight independently of the main body and covering force. Normally, it is organized as a combined arms force consisting of tank, motorized or mechanized infantry, artillery, and engineers. Maximum use is made of artillery, mortar, and long-range ATGM fires through a series of delay positions to prevent

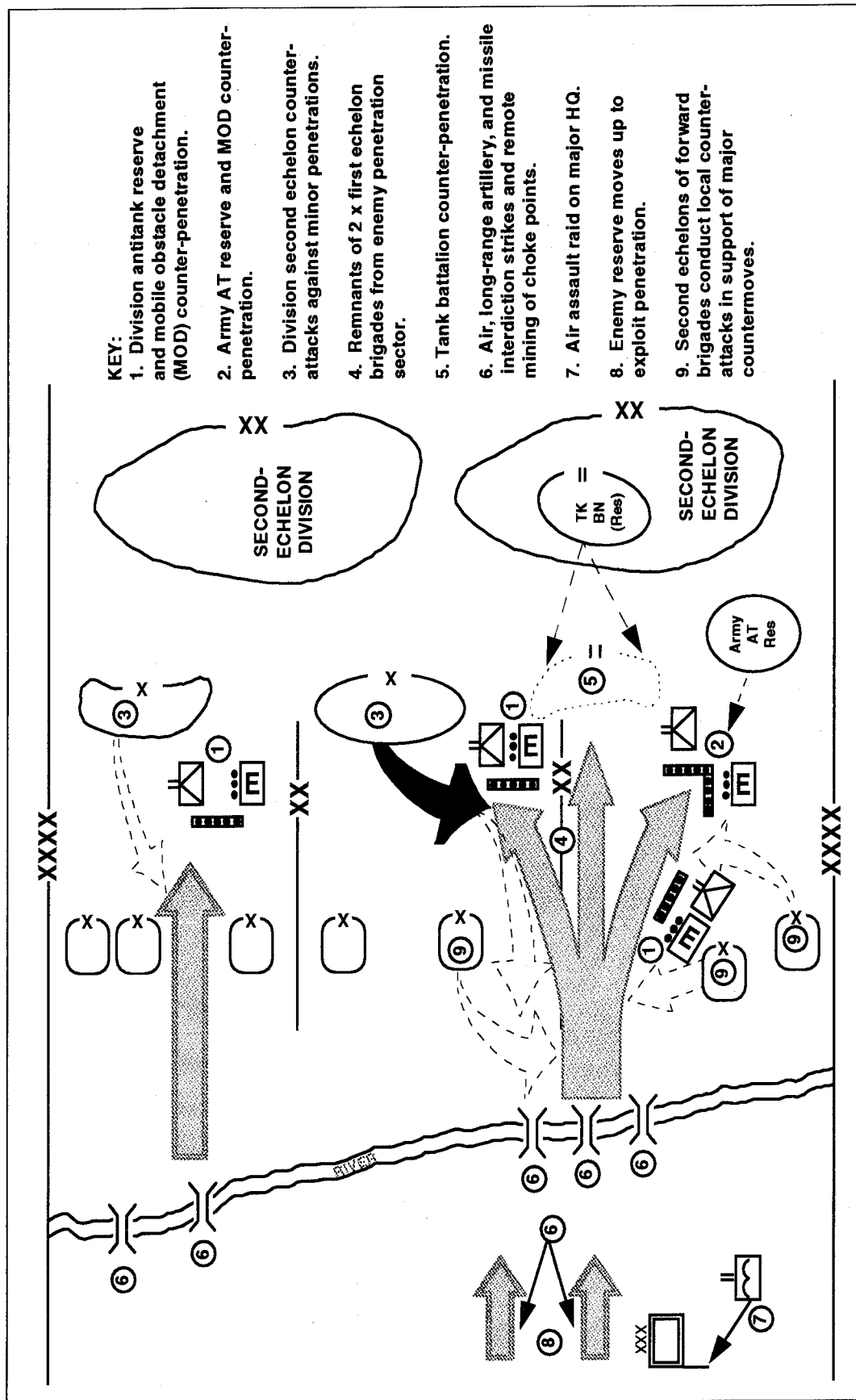


Figure 5-8. Expeditionary army counterattack (variant).

enemy interference in the withdrawal of the main body. The actions taken by the rear guard, both in mission and force disposition, are not unlike those of a forward detachment fighting in the security zone.

Main Body

The main body breaks contact and attempts to withdraw without disclosing its intentions to the enemy. Deception may be achieved by withdrawing under cover of darkness or adverse weather conditions, by using supporting fires to cover noise, or by employing a ruse.

Conduct

A brigade conducts a withdrawal in the following sequence:

- First-echelon battalions designate platoons to act as the covering forces, which attempt to portray a normal defensive pattern to the enemy.
- The brigade commander designates a rear guard, normally the second-echelon battalion, reinforced with part or all of the brigade's organic artillery and engineer assets.
- On order, the main body withdraws through the rear guard in the following order: combat service support elements, combat support elements, and finally the maneuver units.
- The main body proceeds on multiple routes all the way back to either the new defensive position or assembly area.
- Once the main body has completely passed through the rear guard, the covering forces break contact on order and withdraws through the rear guard to join their parent units within the main body. The rear guard fights

a delaying action, leapfrogging to successive positions, using--

- ◊ Smoke.
 - ◊ Engineer-laid minefields.
 - ◊ Artillery fire concentrations.
 - ◊ Ambushes.
 - ◊ Attack helicopters.
 - ◊ Fixed-wing air strikes.
- If the enemy does not pursue, the rear guard assumes march formation and joins the main body as quickly as possible.

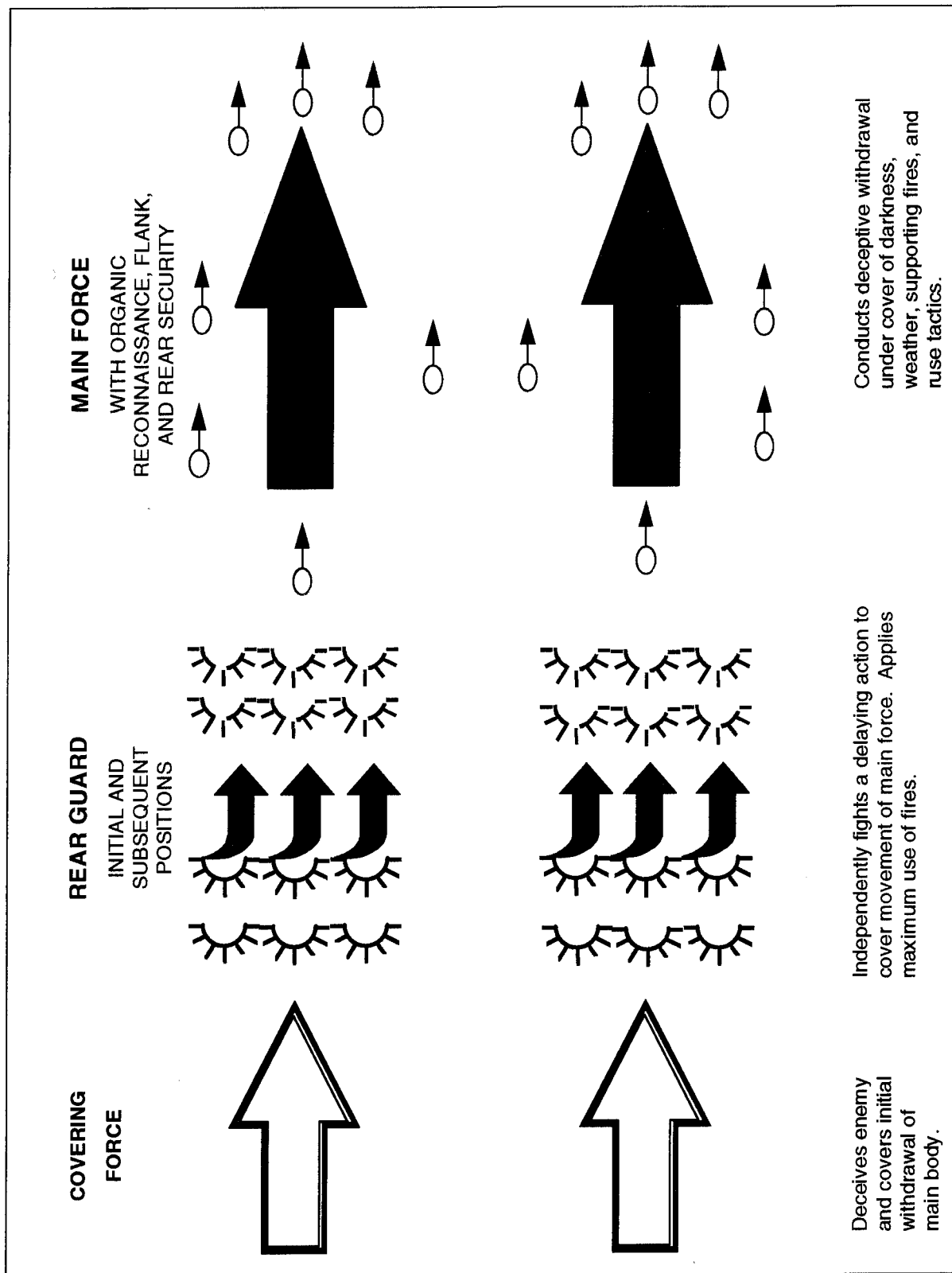


Figure 5-9. Basic concept of the withdrawal.

Chapter 6

Fire Support

CONCEPT FOR FIRE SUPPORT

The OPFOR concept of fire support includes all combat support actions provided to ground forces by artillery, aviation, and naval fires. This chapter focuses on the fire support provided by artillery. Aviation and naval fires are discussed in Chapter 7 (Air and Air Defense Operations) and Chapter 12 (Naval and Amphibious Operations).

The OPFOR considers fire support to be one of the most decisive elements in modern combat. The ability to concentrate fires is one of the principle means of attaining a favorable force ratio against an enemy in a given sector. OPFOR planners recognize the need to integrate all weapon systems into a coordinated fire support plan.

In the **offense**, fire support ensures the uninterrupted advance of ground forces by--

- Blasting gaps in enemy defenses.
- Disrupting and destroying enemy formations in the depth of his defense.
- Stopping and destroying enemy counterattacks.

In the conduct of **defensive operations**, fire support is used to--

- Disrupt enemy preparations for an attack.
- Cause maximum attrition to attacking forces before they reach direct fire range of friendly troops.
- Repel any attacking force that reaches or penetrates OPFOR defenses.

OPFOR fire support concepts are continuously undergoing modification. All operations stress the need to improve interaction between supporting and supported units. Fire support provided by fixed and rotary-wing aircraft is taking on increasing importance. The goal is to integrate the use of assault and attack helicopters with ground maneuver operations.

FIRE SUPPORT ASSETS

Artillery, as defined by the OPFOR, includes the following weapons systems:

- Multiple rocket launchers (MRLs), guns, howitzers, gun-howitzers, and mortars.
- Surface-to-surface missiles (SSMs).
- Free rockets over ground (FROGs).
- AT artillery.

Artillery is capable of suppressing enemy direct fire weapons, attacking enemy artillery and delivering scatterable mines to isolate and interdict enemy forces. It can screen operations with smoke or illuminate the battlefield to facilitate night operations. Artillery can delay or disrupt enemy forces in depth and support aviation operations by suppressing enemy air defenses.

AT weapons are also a part of the fire support system. They are capable of delivering accurate point fire at direct fire ranges. AT guns also have an indirect fire capability.

Fixed-wing aviation provides air interdiction of forces out of range of tube artillery. **Helicopters** give the equivalent of

close air support to provide supporting fires at the front line. Although cross-FLOT attack helicopter operations have been discussed, they require a very permissive air defense situation and would most often be conducted to accompany an air assault operation. They also might support mobile operations by an expeditionary army that is now operating against fragmented resistance, or in the depths of enemy defenses.

The OPFOR **chemical delivery capability** is limited, and chemical munitions are kept under strict national control. Principal delivery means are SSMs, FROGs, and MRLs. OPFOR cannon artillery is capable of delivering chemical munitions; however, there is no evidence to indicate that such rounds have been stockpiled. Incapacitating agents, mainly riot control-type, are available to tactical commanders.

Air defense is an integral part of OPFOR fire support philosophy in all operations. The deployment of fixed and mobile air defense missile and gun systems provides high-to medium-altitude coverage of key areas in peacetime. In wartime this coverage is extended to cover combat formations. Mobile air defense systems assigned to combat units provide short range air defense. They also give ground forces greater freedom of maneuver.

FIRE SUPPORT PLANNING

OPFOR military planners feel that massed firepower is one of the keys to success in combat. Fire support planning is done at the highest level possible. OPFOR planners subscribe to a "top-down" philosophy in the planning and allocation of fire support, basing their plan on the following:

- Scheme of maneuver of supported forces.

- Locations and type of enemy targets.
- Required level of damage.
- Delivery means and ordnance available.

The goal of fire support planning at all levels is to achieve and maintain **fire superiority**. The OPFOR defines fire superiority as a firepower advantage over the enemy in the course of a battle or operation. Fire superiority goes to the side that opens fire first, achieves surprise, and delivers highly accurate and effective fires. It is measured as a unit's ability to execute its own fire missions successfully while suppressing enemy counterfire.

The locations and type of **targets** form the basis for developing fire support priorities. Priority for attacking targets may vary with the level of command and the potential of a target to disrupt planned operations. OPFOR fire support priorities are generally thought to be as follows:

- Enemy fire support weapons (artillery, fixed-wing aircraft, helicopters, and related facilities).
- Combat forces and means in the enemy's tactical depth (forward battalions and brigades) and their command and control facilities.
- Combat forces and means in the enemy's operational depth (division and corps reserves) and their command and control facilities.
- Rear service and support units.

OPFOR fire support doctrine can, in certain circumstances, call for attacks in the enemy's strategic depths. These attacks are conducted by air or SSM fires, and are usually intended to achieve a political objective.

TARGET DAMAGE CRITERIA

Target damage is the effect of fires on a given military target. It results in total, partial, or temporary loss of the target's combat effectiveness. The OPFOR categories of target damage are: annihilation, demolition, neutralization, and harassment.

Annihilation

Annihilation fires make unobserved targets combat-ineffective. For a point target such as an ATGM launcher, the OPFOR must expend enough rounds to assure a 70 to 90 percent probability of kill. For area targets such as platoon strongpoints or artillery assets, they must fire enough rounds to destroy 50 to 60 percent of the targets within the group. These fires result in the group ceasing to exist as a fighting force.

Demolition

Demolition is a subset of annihilation. The OPFOR uses the term in reference to destruction of engineer works. Demolition requires enough rounds to make such material objects unfit for further use.

Neutralization

Neutralization fire inflicts enough losses on a target to--

- Cause it to lose its combat effectiveness temporarily.
- Restrict or prohibit its maneuver. Disrupt its command and control capability.

To achieve neutralization, the OPFOR must deliver enough rounds to destroy 30 percent of a group of targets.

Harassment

The OPFOR uses a limited number of artillery pieces and ammunition within a prescribed time to deliver harassment fires. These fires put psychological pressure on enemy personnel in concentrated defensive areas, command posts, and rear installations. Successful harassment fire inhibits maneuver, lowers morale and interrupts rest, weakening enemy combat readiness.

PHASES OF FIRE SUPPORT

Offense

The goal of fire support in the offense is to provide continuous supporting artillery fires through the depth of the defense. The duration of these fires will vary with circumstances. There are four stages in the fire support of the offense. Each phase may be repeated to support the commitment of subsequent echelons.

- **Phase I:** fire support for the movement forward.
- **Phase II:** fire preparation for the attack.
- **Phase III:** fire support of the attack.
- **Phase IV:** fire accompaniment.

Phase I: Fire Support for the Movement Forward

Phase I applies to conventional support of any uncommitted force moving toward commitment against the enemy. This phase covers a unit's movement from the assembly area to the line of deployment against the enemy forward edge of defense. This phase may also cover a follow-on force's movement forward before commitment.

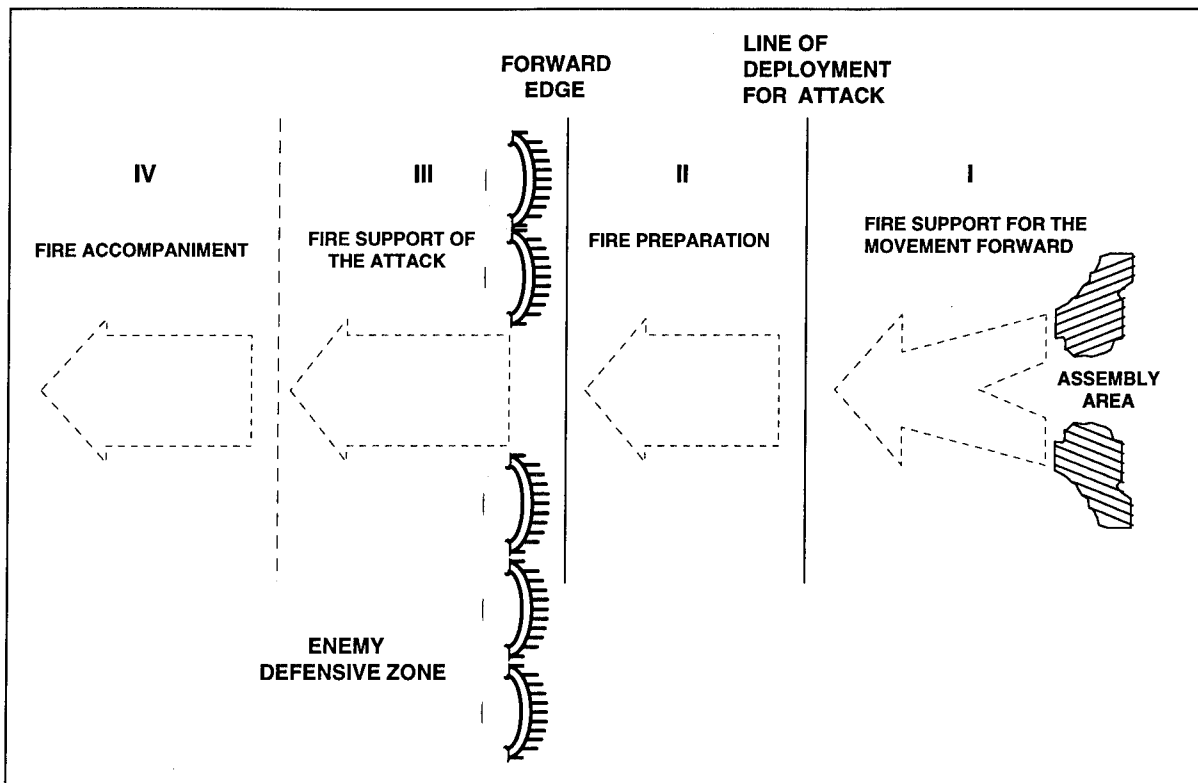


Figure 6-1 Phases of Fire Support

This phase targets enemy long-range weapons that might strike the supported unit while it is still a considerable distance from the forward edge of enemy defenses. These targets will consist of enemy long-range artillery and SSMs. Targets can also include aircraft on airfields and combat helicopters. The OPFOR uses aviation, tactical and operational-tactical SSMs, long-range guns, and MRLs to destroy or suppress deep targets.

This phase may begin more than an hour before the attacking force reaches the enemy's forward edge of defense. The aim is to protect the advancing columns by annihilating or harassing enemy systems that could interfere. Fire for this phase is likely to be conducted from temporary fire positions, with the artillery shifting to its main positions for the preparatory phase. It ends

when the maneuver units are ready to deploy into battalion columns.

Phase II: Fire Preparation for the Attack

Phase II, fire preparation, can apply to the attack or the counterattack. It may also precede the commitment of second-echelon or reserve forces. The artillery preparation should neutralize and/or annihilate a defending enemy with organized, thoroughly planned, and massed fires that deny the enemy the opportunity to organize resistance. The fire preparation should annihilate and neutralize enemy weapon systems, command and control elements, and troops in the tactical and immediate operational depth of the enemy's defenses. The OPFOR strives to achieve fire superiority early to deny any real opposition by the enemy.

The organization of the preparation reflects--

- The overall attack plan.
- The nature of the enemy's defenses.
- The type and density of fire support means being used for the preparation

Targets for the preparation are assigned to missile and rocket forces, artillery, and aviation according to the type of target, its size, degree of hardness, mobility, and depth in the enemy's defenses. The duration of the preparation depends on the enemy's disposition, type of fire support assets used, and type of ground attack to be conducted.

Depending on the combat situation, the preparation may take as little as 10 minutes. However, it typically begins about 20 to 30 minutes before the supported force reaches the forward edge of enemy defenses. It ends when the attacking force goes into its final battle formation, usually within 1,000 meters of enemy defenses. The OPFOR may repeat this fire against well-fortified, deeply-echeloned defenses. Because of the mobility of potential targets and the threat of enemy counterbattery fire, the OPFOR strives to increase and maintain a high density of fire. It tries to reduce the length of this phase by adding more artillery, with special emphasis on MRL units, to the force structure. The OPFOR goal is to achieve the greatest firing density possible, within the time limitations of the preparation.

Phase III: Fire Support of the Attack

Phase III phase begins immediately following the preparatory phase and continues until defending first-echelon battalions are overrun. In this phase, first priority goes to maintaining fire superiority.

As the supported unit advances, fire is planned on targets on sequential lines moving progressively deeper into the enemy's deployment, or directly in front of, and on the flanks of, attacking OPFOR troops. Emphasis is on the continuity of support, ensuring the fire of the artillery and the advance of the maneuver units do not get out of phase. This also hastens the forward movement of assaulting units.

This phase should prevent the enemy from restoring fire, command and control, and observation systems disrupted during the preparation. Fires continue to neutralize enemy troop activity and weapon systems. The fires shift in bands progressively deeper into the enemy's defensive positions.

Phase IV: Fire Accompaniment

Fire accompaniment is the fourth and final phase. It includes artillery and air strikes against troops and weapon systems opposing the attacker's advance as well as against enemy reserves deep in the rear. Artillery units support maneuver units with on-call fires as they exploit their success. The OPFOR continuously refines the artillery accompaniment plan during the attack.

During this phase, artillery units displace with the units they support. They fire on newly located targets or targets that have survived the preparation and support phases. Artillery and combat aviation units coordinate mutually supporting fires with each other and with the supported maneuver unit. They support the commitment of the attacker's second-echelon forces to ensure a high rate of advance. Fires must keep the enemy from using his reserves for counterattacks.

Defense

Defensive fire support planning is highly centralized. Fires are organized to be mutually supporting and provide kill zones or "fire sacks." The fire planner utilizes all available assets to carry out the commander's plan. Several variations of the plan are produced, based on the approach and deployment options open to the enemy. It is recognized that, in the attack, the enemy is likely to enjoy superior fire support. Maneuvering massed firepower against key groupings at the crucial moment then becomes critical. Effective fires in the defense are achieved by surprise, accuracy, and massed fires. To facilitate centralized control and effectiveness, the OPFOR divides defensive fire support into five phases. These are:

- **Phase I:** counterpreparatory fire.
- **Phase II:** fire interdiction of advancing enemy troops.
- **Phase III:** fire to repel the enemy attack.
- **Phase IV:** fire support of defending troops.
- **Phase V:** fire destruction of the enemy during a counterattack.

Phase I: Counterpreparatory Fires

Counterpreparatory fires are an intense delivery of rocket, missile, artillery, and air strikes. The intent is to disorganize and weaken enemy forces preparing to attack. This phase of the defensive fires should surprise the enemy. It should start before the enemy's preparation fires. The intelligence necessary to achieve this is not easy to acquire, and the time required to organize it may be lacking. When accomplished successfully, however, it can be devastatingly effective.

Phase II: Fire Interdiction

Fire interdiction of advancing enemy troops occurs when the enemy deploys into battalion columns. It continues until the enemy forces deploy into attack formations. Attached or supporting artillery units may occupy temporary fire positions beyond the forward edge of defense. Fire on distant approaches is carried out by fixed-wing aviation, SSMs, and long-range artillery. Where possible, enemy units are destroyed as they move up, but if target intelligence is inadequate, disruption and delay can be inflicted by all available assets.

If the defensive is adopted when already in contact with the enemy, this phase concentrates on the enemy's second echelon. Throughout the period before the enemy's attack, attention is paid to denying the enemy good target intelligence for his preparation. As much artillery as possible would remain silent until needed to repel a major attack. Batteries used before the main enemy attack would fire from temporary fire positions or be used as roving batteries to confuse enemy intelligence.

Phase III: Fire to Repel the Enemy Attack

This is the most important phase of defensive artillery fire. The phase begins when the enemy deploys into attack formations and ends when he enters the first defensive positions. Fires create a zone of continuous fires in front of the defense. Fire to repel the enemy attack coordinates artillery fire with antitank weapons and all weapons of the maneuver units.

During this phase, OPFOR artillery tries to break up enemy attack formations, splitting armor from infantry by firing

planned concentrations in front of defensive positions, and minefields in gaps between strongpoints, and in depth. Guns and MRLs start to engage the enemy 15 to 25 km from the line of contact, and howitzers open fire when the enemy is within 10 to 15 km. Short but intense fire strikes, no more than 15 to 20 minutes in duration, are fired, followed by displacement to alternate fire positions to avoid counter-battery fire.

Phase IV: Fire Support of Defending Troops

Fire support of the defending troops occurs when artillery units attack enemy forces that have penetrated the defensive positions of first-echelon maneuver battalions. The goal is to create kill zones that destroy the enemy, preventing him from continuing the offense into the depth or flanks. Some batteries may enter preselected direct fire positions. The defender will fire against individual targets.

The enemy is expected to penetrate the defense, but to pay an appropriate price and be canalized. The artillery supports defensive positions in depth, and disrupts the enemy by separating his infantry from armor and his fighting troops from their logistics support. If necessary, artillery may even be used in the direct fire role against armored penetrations. Generally, the artillery plays a key role in creating suitable conditions for the launching of a counterattack.

Phase V: Fire Destruction of the Enemy During Counterattack

The final phase of defensive fires is the destruction of the enemy during the counterattack. Its goals are to recover lost positions, destroy penetrating enemy forces, and to capture a line to launch offensive op-

erations. This phase has three subphases for artillery support:

- Support for the forward movement of troops.
- Preparation of the counterattack.
- Support of the counterattack.

A successful counterattack requires a stabilized line of contact. This line allows enough time for the second-echelon forces to advance and deploy for the counterattack. Fires are delivered to cover the forward movement of OPFOR troops while also engaging weapons systems that could impede the move forward.

FIRE SUPPORT TARGETING

The success of the fire support plan depends on timely and accurate information. The basic intelligence requirements for fire support planning are:

- Disposition of enemy forward units.
- Locations of enemy artillery and other fire support systems, observation posts and radar sites.
- Locations of enemy armor and troop concentrations in rear areas.
- Locations of fortifications and barriers.
- Locations of enemy command and control facilities.
- Terrain analysis of the area where the enemy is deployed.
- Post-strike analyses.

Ground or air forces can perform reconnaissance. Ground reconnaissance is conducted by mobile and/or fixed elements of combat forces or special operations/reconnaissance units, using visual, instrumental, and photographic means. Aerial reconnaissance is conducted by both fixed wing aircraft and helicopters. Special operations forces can conduct long-range re-

connaissance in the enemy's rear area to locate targets for missile strikes.

ARTILLERY FIRE SUPPORT

Artillery fire support is a key element of OPFOR operational planning. The OPFOR employs artillery in mass and under centralized control. They place great emphasis on detailed planning and coordination of fire plans to support maneuver units. The characteristics that give artillery fire support significance are:

- Range.
- Destructive power and accuracy.
- Capability for wide maneuver both

by fire and of the weapons themselves.

- Rapid concentration of fires on important targets.

Organization and Equipment

OPFOR SSM brigades are subordinate to the General Staff (See Figure 6-1.). These brigades have short-range tactical ballistic missiles that can deliver improved conventional, and possibly chemical munitions, as far as the capital of any country in the region. SSM fires may be planned in support of military region actions and executed at the request of the military region commander.

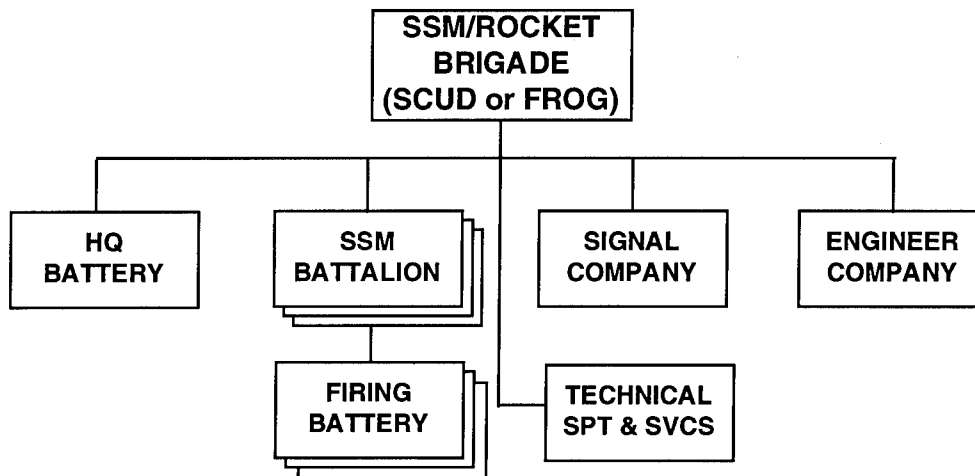


Figure 6-1. SSM/rocket brigade, national.

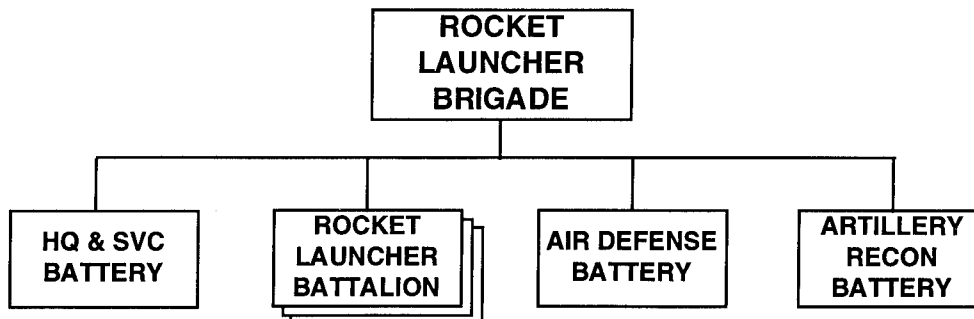


Figure 6-2. Rocket launcher brigade, national.

Due to its great political potential the targeting of SSMs is controlled at the national level. Therefore, SSM brigades remain under General Staff control, even when they are allocated to support a particular military region. The military region retains responsibility for the movement, survivability and support of the SSM brigades.

Along with SCUD equipped SSM brigades, the General Staff also controls **rocket brigades** equipped with shorter-range FROG battlefield support rockets. The rocket brigades are allocated to the military region conducting the main effort. This provides that region with long-range tactical fires. Employment is against static targets of large proportions, such as enemy airfields, staging areas, rear services, and maintenance units. The introduction of MRLs with ranges equal to these battlefield

rockets has blurred their role making their use interchangeable.

The General Staff has several brigades of self-propelled and towed artillery, and rocket launcher brigades. The **artillery brigades** are equipped with a mix of howitzers, field guns, and gun-howitzers (See Figure 6-3.). The **rocket launcher brigade** is equipped with long-range MRLs (See Figure 6-2.). These forces are allocated down to the military regions to attack deep targets, and to provide massed artillery fires in support of the main attack. Each military district has an organic **artillery regiment** consisting of a howitzer battalion, one or two **gun-howitzer battalions**, and an **MRL battalion** (See Figure 6-5.). Forces allocated to the military districts can be allocated down to individual maneuver brigades.

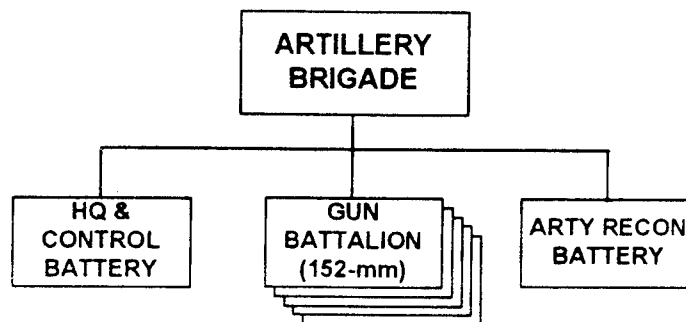


Figure 6-3. Artillery brigade, army or national.

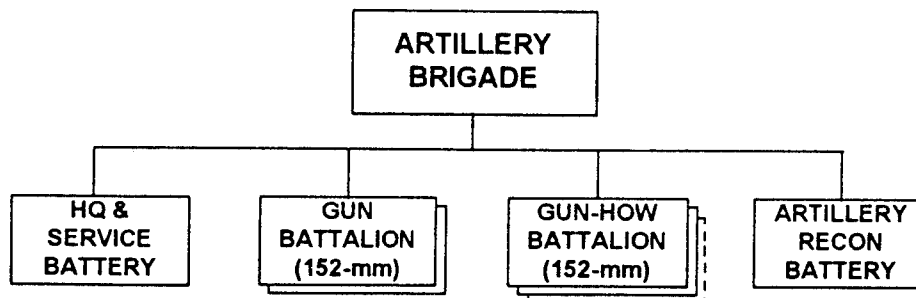


Figure 6-4. Artillery brigade, national.

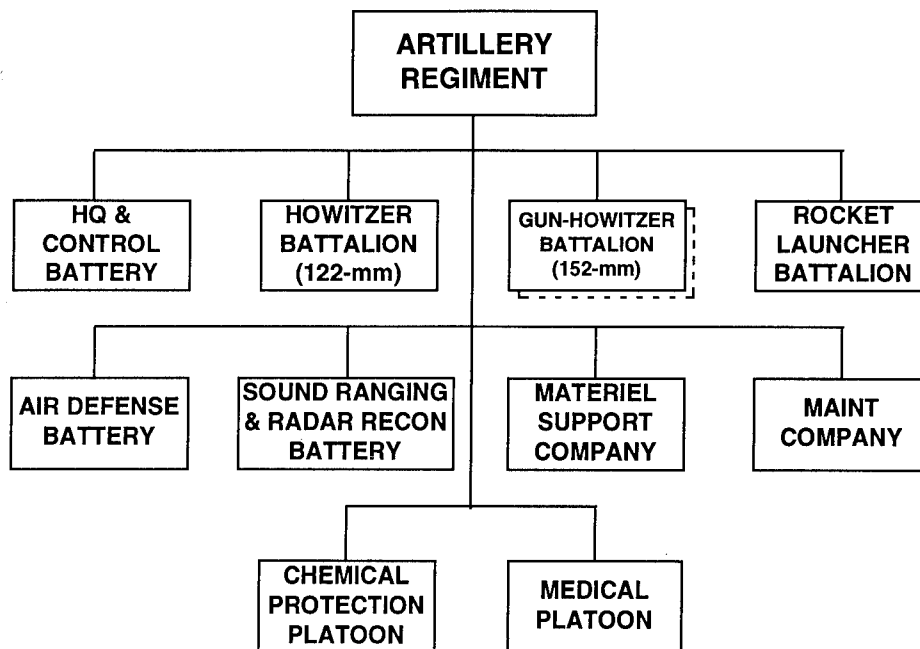


Figure 6-5. Artillery regiment, self-propelled or towed, army, military district, or national.

Most OPFOR brigades have either an artillery or mortar battalion, and their maneuver battalions have a mortar battery. The artillery assets and organizational structure vary according to the type (i.e., light infantry, motorized infantry, armor, etc.) and mission of the particular brigades and their battalions.

Allocation Principles

Allocation of artillery assets is a “top-down” process. The allocation of artillery by a higher echelon to maneuver forces for the execution of a given battle or operation follows these principles:

- The General Staff allocates artillery units and/or assets to the military regions based on the importance of their respective missions.
- A military region mobilizing an expeditionary army is allocated additional assets for the army to conduct

operations. Remaining artillery assets are allocated to other regions, based on their needs.

- The expeditionary army in turn allocates artillery to divisions, especially those in the main attack.
- Regions on the defense allocate artillery to subordinate districts, based on their needs and the probable locations of the enemy's main attack.
- A military district or division may place some of the artillery with its brigades.
- Second-echelon forces normally do not receive artillery reinforcement until they are committed.

ORGANIZATION FOR COMBAT

It is the OPFOR practice to augment organic artillery available to maneuver units by allocating additional assets, either through attachment or assignment as sup-

porting artillery. An **attached** artillery unit (and organic artillery) is under the operational control of the maneuver unit commander. An artillery unit assigned to **support** a maneuver force remains subordinate to its parent artillery unit or group, but carries out missions assigned by the maneuver commander.

The fire plan of an attached artillery unit reflects the specific support of the unit to which it is attached. The senior commander allocating artillery can change the mission of attached or supporting artillery at any time during the course of the battle. The period of attachment is usually for the time it takes to accomplish a particular mission.

Artillery Groups

Temporary, mission-oriented **artillery groups** form the framework for control of artillery fires. The formation of groups allows maximum use of assets, provides continuous support, and retains the required degree of centralized control. Artillery groups are normally composed of two to four battalions and can include guns, howitzers, gun-howitzers, and MRLs. A designated commander and staff provide command and control of artillery groups. This is normally the commander of the artillery unit that is the nucleus of the group.

Groups formed to support offensive operations--- such as the expeditionary army offensive, army or military region counterattacks, or military district limited-objective attacks--- remain intact during the attack and consolidation phases of the battle. During the exploitation and pursuit phases, the increased tempo of offensive operations requires decentralized control of artillery assets, and these groups are dissolved or reorganized. Commitment of second-echelon

forces usually occurs during these phases, and artillery groups are reorganized to provide support for these forces. Groups created for defensive operations normally remain intact until the offensive is resumed. Due to their primarily defensive missions, groups formed for the defense of a military region are much longer-lasting.

Expeditionary Army

Army artillery group (AAG). Due to the importance of its mission, the expeditionary army receives artillery first from the General Staff. Prior to its mobilization, the army has no organic artillery. When the army commander receives these national assets, he decides, based on the concept of the operation, what artillery to further allocate to subordinate divisions. The division with the major army mission receives the most artillery. The remaining artillery may be formed into an AAG, which would then assume the primary counterbattery mission for the expeditionary army.

Division Artillery Group (DAG). The division commander also allocates artillery, resulting in the formation of a DAG and several brigade artillery groups (BrAGs). The division may organize more than one DAG due to span of control, number of battalions available, and assigned missions. The DAG varies in size from two to four battalions and is employed in general support of the division. It assists the army with the counterbattery mission. If capable, it may perform this mission itself.

Brigade artillery group (BrAG). Brigade artillery groups are formed from organic and attached artillery and nondivisional artillery assigned to provide support to first-echelon brigades. Normally, BrAGs are composed of two to four battalions; they

destroy targets that hinder the advance of attacking forces.

Other Military Regions

Military region artillery group (MRAG). Once the requirements of the expeditionary army are met, the General Staff then allocates assets to other military regions based on the needs of the defending regions. Like the army, military regions have no organic artillery during peacetime. Unlike the army, however, regions have no subordinate divisions with organic artillery. The districts subordinate to the region may or may not have artillery organic at district level. For this reason, most of the artillery received by a region is normally suballocated to the districts. Another reason is that the region, due to the extended frontages over which the defense would be conducted, would have problems providing effective support. If the region forms an MRAG, its primary mission is counterbattery fire. The favored composition is long-range rockets and MRLs.

Military district artillery group (MDAG). Once the district commander takes the artillery allocated by the region, he has several options. Depending on the amount of artillery received and the scope of his defense, he may keep some at district level and allocate the remainder to his separate brigades, resulting in the formation of an MDAG and several BrAGs. The brigade sector in which the enemy's main attack is expected receives the most artillery. He may organize more than one MDAG due to span of control, number of battalions available, and assigned missions. If the defense is conducted over an extended frontage, he may also allocate all artillery to subordinate brigades. If formed, the MDAG varies in size from two to four battalions and is employed in general support of the district. It

may assist the region with the counterbattery mission. If the region does not form an MRAG, it will perform this mission itself.

Brigade artillery group (BrAG). BrAGs supporting the separate brigades of a district are formed from organic and attached artillery and nondistrict artillery assigned to provide support to first-echelon defending brigades. These groups, as with BrAGs within divisions, are composed of two to four battalions.

FIRE CONTROL

OPFOR artillery units deploy a network of **observation posts** to control artillery fires and gather target intelligence. The network of observation posts includes command observation posts and forward observers. The numbers and types of observation posts established depend on the requirements of the operation. These observation posts are as mobile as the forces they are supporting. Several intelligence capabilities, such as flash ranging and visual observation, can be combined in single posts.

Artillery units may also organize and dispatch **artillery reconnaissance patrols**. These patrols try to locate enemy artillery units and may penetrate enemy territory to establish observation posts and adjust artillery fires.

METHODS OF FIRE

The OPFOR uses various types of fires on the enemy. The methods of fire it employs can have different purposes in the offense and defense and it can also conduct different types of fire for both. An OPFOR fire planner selects methods based upon desired coverage, effects, and fire density.

The following defines types of fire and methods the OPFOR employs.

Rapid Fire

Rapid fire is a method to conduct artillery fire by firing the weapon as quickly as possible. The weapon does not exceed its maximum rate of fire or sacrifice accuracy. When the commander orders rapid fire, each individual weapon crew begins to fire independently when ready.

Systematic Fire

Systematic fire is a method that fires every round, or salvo, on command at a set interval. The OPFOR uses this method for firing on observed targets during registration or when the unit is firing a demolition mission. The OPFOR also uses systematic fire against unobserved targets under the following circumstances:

- In the course of fire assaults of a given duration.
- During controlling fire.
- During harassing fire, usually alternating with rapid fire.

The tempo of systematic fire against observed targets depends on the capabilities and equipment of the observer. The time allotted for the expenditure of an amount of ammunition determines the tempo of fire against an unobserved target. The tempo of systematic fire is constant during a fire assault, but harassing fire may have an intermittent tempo. A single weapon, a firing platoon, or an entire battery may fire systematic fire. On receiving the mission, the firing unit also receives a rate of fire and an ammunition expenditure requirement.

Counterbattery Fire

Counterbattery fire accomplishes the neutralization and/or annihilation of enemy artillery batteries. Combat with enemy artillery is one of the OPFOR artillery's most important missions. It enables the OPFOR to achieve fire superiority on the battlefield. Combat with enemy artillery now requires more than counterbattery fire. It requires the destruction of the enemy command and control centers as well as his artillery. To be effective it also requires the cooperation of the other combat arms and combat aviation.

Maneuver by Fire

Maneuver by fire occurs when a unit shifts fire from one target, or group of targets, to another without changing firing positions. This is a combined arms concept in which the artillery plays a critical role. Maneuver by fire masses fires on the most important enemy objectives and troop formations. Its goal is to destroy the enemy in a short period of time or to redistribute fires to destroy several targets simultaneously. The method also may shift the main combat effort from one direction to another.

In the **offense**, maneuver by fire in the depth of the enemy's defenses--

- Neutralizes enemy strongpoints.
- Repels counterattacks.
- Covers the attacking unit's with protective fires.

In the **defense**, maneuver by fire --

- Destroys the enemy as he deploys to attack.
- Repels the attack.
- Supports a counterattack force.
- Protects gaps in the defenses.
- Seals off enemy penetrations.

- Assists neighboring units.

Wide use of maneuver by fire helps the defending commander achieve fire superiority at the critical time in decisive sectors. The defensive fire plan normally includes plans for maneuver. In such planning, artillery units have several supplementary assigned sectors of fire. These sectors cover areas along the supported unit's flanks and the gaps between units.

OFFENSIVE FIRES

The OPFOR plans offensive fires to support the attack and complete the destruction of the enemy. Discussion of the types of offensive fire follows.

Fire Assault

Surprise and a high density of fire on the target characterize the offensive fire assault. It consists of several batteries or battalions firing against an individual target. Fire assaults are the major subelements of an artillery preparation for an attack. All, or at least the larger part of, the artillery of a division or army carry out these assaults simultaneously on a large group of targets. Fire assaults may annihilate or neutralize targets. Factors determining the number of fire assaults on a target are:

- The area/nature of the target to be destroyed.
- The number of rounds allocated for its annihilation/ neutralization.
- The range to the target.
- The number of tubes available.
- The types of ammunition available.
- The time required for artillery to prepare and expend the rounds allocated.

The tactical situation and the maximum rate of fire of the weapons firing the mission determines the duration of the fire assault. A fire assault of a given duration typically begins with rapid fire of two to four rounds per minute per weapon. It continues with systematic fire at a rate that uses the allocated ammunition in the time allotted for the mission. To destroy a target in the shortest possible time, the OPFOR does not fix the duration of the assault. Artillery subunits conduct the mission at rapid fire until it expends the allocated ammunition.

Controlling Fire

OPFOR artillery directs controlling fire at an enemy target in the intervals between fire assaults on the same target. Controlling fire denies the enemy the freedom to conduct combat activity and prevents escape before the next fire assault. The planner uses this method when the interval between fire assaults exceeds 15 minutes. A single battery usually conducts this fire at a systematic rate of fire, rapid fire, or a combination of the two. This ensures a smooth transition for supporting fires.

Fire Concentration

Several batteries or battalions may simultaneously conduct a fire concentration against a common target. The dimensions of the fire concentration target area depend on the fire mission and the firepower of the artillery subunit firing the mission. Batteries and battalions conduct fire concentrations with all weapons firing at once on the center of the target area. All weapons may fire on the same elevation and deflection settings or some units may use different settings. This

depends on factors such as target disposition and whether the target is "observed."

Massed Fire

OPFOR artillery masses fire against an enemy objective with all or most of a given unit's artillery, with the goal of destroying it in the shortest possible time. This massed fire can be one large fire concentration or several large fire concentrations fired simultaneously. Before conducting massed fire, the artillery battalion chief of staff designates target areas and assigns each firing unit an area. If the dimensions of the target area do not exceed 800 by 800 meters, all participating artillery groups fire simultaneously on the center of the target area; applying the principles used for fire concentrations. If the target area is larger than 800 by 800 meters, the target has subdivisions of numbered targets or target sectors. The fire planners designate target or target sectors to the assigned artillery groups or subunits to annihilate or neutralize with fire concentrations. The artillery units fire the mission simultaneously to the extent possible

Successive Fire Concentrations

OPFOR artillery fires successive fire concentrations in the attack when the supported maneuver unit begins the final assault on enemy defensive positions. The artillery fires concentrations for the successive neutralization or annihilation of specific targets, or target groupings deployed to the front and on the flanks of attacking troops. Successive fire concentrations primarily support the offense, but can support counterattacks in the defense. Successive fire concentrations may be single or double.

In a **single** successive fire concentration, artillery unit fires initially on the single line of targets closest to the attacking troops. It shifts the single fire concentration to progressively deeper lines or groups of enemy targets as the supported attacking troops advance. The principal weight of fire concentrates on neutralizing the enemy's forward defensive positions.

A **double** successive fire concentration requires two artillery groups to fire simultaneously. The first group fires on the line of targets closest to the supported attacking troops. The second group fires on the next line of targets. The first group then shifts its fires from the first line of concentration to the second line. The second group shifts its fires from the second line to the third and so on. In a double successive fire concentration, every line of targets, except the first, receives fire twice.

The first line of concentration covers the defender's forward positions. Subsequent lines of concentration are 300 to 1,000 meters apart through the depth of the enemy's defenses. On each successive fire concentration, the fire planner assigns concentration sectors to every battalion or battery firing the mission. Attacking troops normally deploy into a special battle formation at the line of attack. Here, preparatory fires become supporting fires. The time required for troops to travel from here to the troop safety line is important as it determines the duration of fire on the initial line of targets (concentrations).

The maneuver commander signals initiation of this fire when the ground assault begins. The supported maneuver brigade or battalion commander gives a signal to shift fire to each subsequent line of concentration. The OPFOR can use fire support helicopters

attacking beneath the trajectories of artillery rounds during these concentrations.

Rolling Barrage

The support phase of the attack normally uses the rolling barrage. The rolling barrage is a continuous curtain of fire. It successively shifts from one phase line to another in front of attacking troops. Like successive fire concentration, it may fire against a single line or against two lines simultaneously. The supported maneuver commander orders the fires to shift to support the advance. The rolling barrage differs from the successive fire concentration in that it assumes a uniform distribution of targets throughout the target area. It then shifts fire between uniformly spaced phase lines. (The successive fire concentration focuses on targets that require concentrated fires. The target location determines the intervals between lines.) The rolling barrage may have a fire concentration superimposed to ensure the destruction of the most important targets.

In the rolling barrage, phase lines have planned concentrations every 400 to 800 meters. The spacing depends on the density of targets in the target area. Planned intermediate phase lines lie every 100 to 200 meters. Artillery units will fire on each phase line for at least 5 minutes at a rate of 4 to 6 rounds per 100 meters per minute. They will fire on each intermediate line for 1 or 2 minutes at the same rate. A rolling barrage has battalion and battery sectors with standard widths. (See Figure 9-5.)

The division or brigade commander gives the order to shift from a phase line. However, fires shift automatically from intermediate lines in accordance with a timed firing program.

The depth of a rolling barrage depends on the nature of the enemy's defenses, the attack plan, and the availability of artillery and ammunition. Normally, there is a rolling barrage through the depth of the defenses of the enemy's first-echelon battalions. The rolling barrage requires a great deal of ammunition. It is not, therefore, the most likely method of offensive fire. A rolling barrage, however, may support a penetration of well-prepared defensive positions and forced water obstacle crossings.

DEFENSIVE FIRES

The OPFOR plans defensive fires to disrupt the enemy's attack. **Barrier fires** are the primary type of defensive fires. Barrier fire is a continuous curtain of defensive fire across the approach of attacking enemy forces. Although normally used in the defense, it also has applications in offensive operations against enemy counterattacks. Barrier fire is useful with fire concentrations, massed fires, and directly aimed fire from tanks and guns. The types of barrier fire are--

- Standing barrier fire.
- Rolling barrier fire.

Standing Barrier Fire

Standing barrier fire uses a single line of concentration to disrupt an enemy attack. The OPFOR plans standing barrier fires well in advance. It projects artillery fires for likely tank avenues of approach. A ground observation post observes these fires planned in front of, and to the flanks of, the defensive positions. All the artillery in a formation, except MRLs, fires the standing barrier fire. The fire planner assigns each battalion or battery a sector on the line of fire concentration. The width of each unit's

sector is computed based on 50 meters of coverage per gun (howitzer) or mortar.

The line of concentration for the standing barrier fire must be no closer than 300 to 500 meters from friendly troops for safety. This allows gunners to fire AT weapons in direct fire at enemy tanks and APCs as they come through the barrier fires. Standing barrier fires begin when enemy tanks and infantry approach the planned line of fire concentration. The fires continue at rapid fire until they cut off the enemy's infantry from his tanks and halt his attack. If the enemy maneuvers around the fire concentration line, the fires shift to the new approach.

Rolling Barrier Fire

Rolling barrier fire lands on several lines of concentration. Each line lies successively closer to OPFOR defending troops. Lines of concentration for the rolling barrier fire should impact on terrain that a ground observation post can see. Distances between lines of fire concentration are 400 to 600 meters or more. The final line of concentration closest to friendly troops is 300 to 500 meters from forward defensive positions. The fire planner assigns every battalion or battery participating in the fire mission a sector of fire on each of the lines of fire concentration. He bases the width of each sector on 25 meters of coverage for each gun (howitzer) or mortar.

Each individual line of concentration has a number in sequence, beginning with the one farthest from the defensive positions. The rolling barrier fire begins the moment the lead tanks or APCs approach the initial line of fire concentration. The fire continues on that line until the bulk of the advancing force has moved out of the zone where

rounds impact. Then the fire shifts to the next line of concentration. Fires continue to shift until surviving enemy APCs or tanks have passed through the last zone of fire concentration.

SUPPORT IN THE OFFENSE

Artillery support in the offense is planned to be concentrated and continuous in the direction of the main attack. Offensive artillery fires try to maintain continuous support from initial **preparatory fires** until units reach the attack objective. Concentration includes the concept and tasking of all artillery support up to and during the commitment of the second echelon. Use of selected lines controls the shifting of fires, displacement of artillery units, and changes in command relationships between artillery units and supported units.

Continuous support is accomplished by displacing artillery by bounds using the **concept of thirds**. Only one-third of the available artillery is moving at a given time. This pattern of movement leaves two-thirds of the available artillery in position to support the assaulting forces. The normal size unit that displaces during this movement is a battery.

Artillery support of an attack begins when friendly units begin their assault on the enemy's defenses and continues as they advance into the enemy's positions. During this phase, artillery fires on the enemy immediately in front of and on the flanks of friendly troops. Fires shift progressively deeper into the enemy's territory to maintain the attackers advance. The duration of fires depends on the amount of time required for friendly troops to move from the line of attack to the safety line of the barrage being fired. Fires shift from line

to line on direction of the supported unit commander.

During **artillery accompaniment**, artillery supports maneuver units exploiting their success in the rear of the enemy's defenses. The accompaniment begins upon penetration or bypassing of first-echelon enemy brigades and continues until attacking units have accomplished their mission. Artillery units displace with supported units and fire upon newly appearing targets or previously fired targets that still offer resistance. There is an increased use of direct artillery fire during this phase. If the enemy counterattacks, artillery fires on the counterattack force as it advances and deploys.

The fire and maneuver of artillery units during the accompaniment is planned in the initial fire support plan for the offensive operation. The accompaniment portion of the plan is continually updated during the attack. Artillery accompaniment is done in close coordination with aviation elements and other forces and means.

SUPPORT IN THE DEFENSE

Defensive fires consist of fire strikes by all available assets against likely enemy avenues of approach and zones of continuous fire across the front. Emphasis is on close coordination between artillery, rocket systems, and aerial delivery systems. Intelligence assets try to locate enemy formations and attack positions, with the goal of determining the direction and composition of the enemy main attack.

As in the offense, **maneuver by fire** in the defense consists of shifting concentrated fires against the enemy's attack formations, targets in the enemy rear, and for covering friendly flanks. These concen-

trated fires take the form of **barrier fires** in the defense. Barrier fires try to provide a continuous wall of fire across the approach axes of enemy forces. Standing barrier fire uses a single line of concentration to disrupt the enemy attack. Rolling barrier fires land on several lines of concentration, each line successively closer to friendly troops. These methods of barrier fire provide the ability to shift fires as the enemy maneuvers. Careful analysis of the terrain over which the enemy will advance, and channeling his movement, create conditions for decisive fires in the defense.

The artillery **organization for combat** in the defense parallels that of the offense. Artillery groups are positioned so that they may accomplish their primary missions and retain the capability of massing fires in support of forward positions. The defensive fire plan tries to achieve the following:

- Annihilation or neutralization of the enemy's artillery and rocket systems.
- Neutralization of enemy command and control centers.
- Neutralization of enemy columns and troop concentrations.
- Neutralization of the enemy in front of forward defenses.
- Neutralization of enemy forces that have penetrated forward defenses.
- Coverage of gaps and flanks in friendly sectors, obstacles and natural obstructions.

During the conduct of the defense selected artillery units can occupy temporary firing positions forward supporting forces in the security zone. **Roving guns and batteries** may also be employed in the security zone. Their goal is to confuse the enemy as to the deployment and fire plans of friendly artillery forces. The deployment of roving guns or batteries is planned in detail cover-

ing locations of positions, method of fire and number of rounds to be fired from each position, movement schedule of the gun or battery, and duration of its mission. Roving guns and batteries may leave camouflaged decoys in the position to create the impression it is still occupied.

AT FIRE SUPPORT

The OPFOR concept of antitank (AT) fire support states that effective AT combat demands close, careful and complete integration of AT weapons into the AT fire support plan. Like most modern armies, the OPFOR divides AT weapons into two categories: **general** and **special** AT weapons. General AT weapons systems include aircraft, tanks and artillery. The design of these weapons is to destroy a variety of battlefield targets including tanks and other armored vehicles. The special AT weapons include antitank guided missiles (ATGMs), AT guns, recoilless guns/rifles, and grenade launchers. These weapons are designed to destroy tanks by direct fire.

The AT fire support plan is developed in great detail and coordinated at the highest level possible. Fire support planners conduct detailed terrain analyses to identify armor approaches. Planners then site weapons to provide in-depth, mutually supporting coverage of armor approaches and provide protection to flanks. They place special emphasis on the organization of an observation and early-warning network.

Organization and Equipment

Infantry units below brigade level generally have light AT weapons assigned down to the squad and platoon level. These provide point defense against unexpected enemy armor, and may be used against other

hardened targets as necessary. Light and motorized infantry battalions have specialized AT platoons, while mechanized infantry battalions rely on their APCs main armament for this protection. Divisional brigades each have an ATGM battery, and districts and divisions have an AT battalion that serves as their dedicated AT reserve. Separate brigades have an AT battalion organic that serves the same functions. The General Staff has several AT gun battalions it can allocate to the region expecting the greatest armor threat.

Employment

AT assets are normally employed as an **AT reserve** for the maneuver formation. These reserves can be for both offensive and defensive operations. They normally consist of guns and ATGMs and generally operate with an engineer mobile obstacle detachment (MOD) to lay minefields and construct obstacles in threatened areas. Any additional assets attached to the AT reserve are subordinate to the AT artillery commander.

Where an AT reserve is held, and how far from the line of contact (or head of tactical march column) depends on the operational or tactical situation. If a generalization has to be made, it would be that the AT reserve deploys between the first and second echelon. Both in the advance and in defense, it is usual to designate two, three, or even more alternate lines of commitment on each axis, depending on the assessment of likely enemy actions:

AT reserve deployment, and the laying of their protective minefields by MODs, is often left to the last minute, sometimes done under enemy fire and relying on smoke cover to protect deployment. While risky, it ensures that the AT reserve

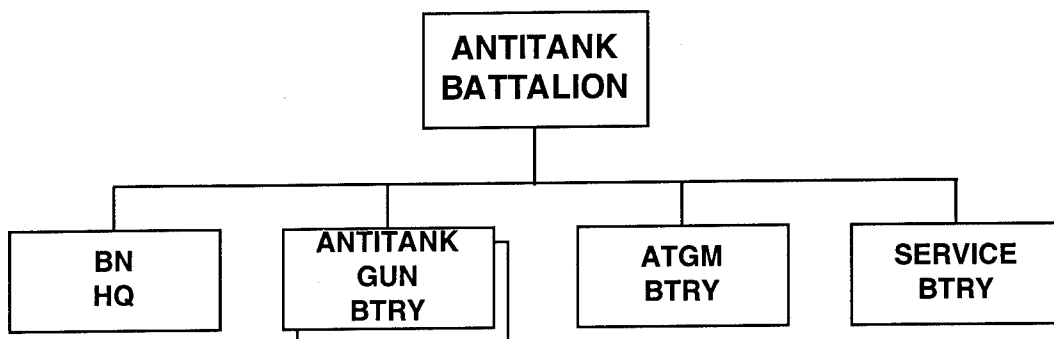


Figure 6-6. Standard AT battalion.

has deployed on the correct axis because the enemy has already committed himself to that direction. The sudden appearance of such a reserve can inflict considerable delay and disruption if the enemy has not anticipated its use.

Support in the Offense

In **preparation** for the attack, AT assets are located on the most likely armor approaches, or they may be positioned well forward to participate in the artillery preparation phase of the attack.

Typical tasks for AT units during the preparation phase are:

- To contain enemy armor.
- To cover the deployment of attacking units.
- To engage armored and AT targets on the forward edge of the enemy position as part of the preparatory fires.

During the **support phase** of the attack, AT units will be tasked to:

- Cover the flanks.
- Support the deployment of the second echelon or reserve.
- Assist in consolidation on the objective.

During the offensive, the AT reserve usually moves behind the advancing first echelon on the most exposed axis. Successive fire lines are designated to cover likely tank approach routes. The AT unit commander selects firing positions. The AT reserve advances to these successive lines, based on the progress of the attacking force and on the order of the maneuver unit commander.

In anticipation of a meeting engagement, AT units travel at the rear of the advance guard or at the head of the main body. At the beginning of an engagement, they deploy into the threatened sector to cover the deployment of the maneuver force.

Support in the Defense

The AT fire support plan is developed in more detail for the defensive phase of a battle or operation than in the offensive phase. The AT fire plan places enemy armored forces under continuous fire from their first detection until their destruction in a **"kill zone"** in front of first-echelon defensive positions. Fixed-wing aviation, MRLs, and massed artillery may be employed against detected armor in its assembly areas. ATGM-equipped helicopters are effective against moving armor targets.

Indirect artillery and MRL fires are effective in isolating tanks from supporting forces and forcing tanks crews to "button up." Although indirect fires can increase the vulnerability of attacking tanks, the smoke and dust of impacting rounds can degrade the effectiveness of direct fire systems by impeding gunner vision.

In the defense, AT units have the following missions:

- Destroy enemy tanks and armored vehicles that have penetrated the first defensive echelon.
- Reinforce AT defense of the first echelon.
- Cover the deployment of counterattacking units.

If the defending units have to withdraw, AT assets can cover the withdrawal of forward elements. AT units then break contact, displacing by battery to subsequent firing positions.

THIS PAGE INTENTIONALLY BLANK

Chapter 7

Air and Air Defense Operations

AIR FORCE

The OPFOR possesses the strongest, best trained, and best maintained Air Force in its region of the world. Foreign governments provided significant military assistance to the OPFOR Air Force during the 1980s, which consisted of materiel and equipment, maintenance, and training. As with its logistics system, the air and air defense doctrine of the OPFOR represents a blend of principles growing out of both past experience and doctrine adapted from foreign advisors.

While it is the strongest in the geographic region, the Air Force is not strong enough to defeat the Air Forces of a first-class power from outside of the region. Realizing the limitations of its Air Force, the OPFOR has established a two-tiered air defense system incorporating airborne and ground-based weapons systems. To further ensure the security of the State from air attack, the OPFOR ground and air forces continually improve air-ground coordination to enhance their air defense capability.

Organization and Equipment

The Air Force is subordinate to the General Staff. It is organized into fighter-bomber regiment(s); fighter-interceptor regiment(s); fixed-wing transport regiment(s); transport helicopter regiment(s); and combat/attack helicopter regiment(s).

The aviation regiments are generally composed of three homogeneous squadrons, a headquarters element and a service and support element, as shown in figure 7-1. In peacetime, the Air Force is based at permanent airfields. Dispersal to smaller airstrips is a key indicator of imminent hostilities.

Unlike the situation in many countries which subordinate rotary-wing assets to ground forces, the Air Force has sole control of all aircraft. All rotary-wing aircraft, both attack and transport, belong to it. The OPFOR Air Force maintains all equipment and assigns all missions.

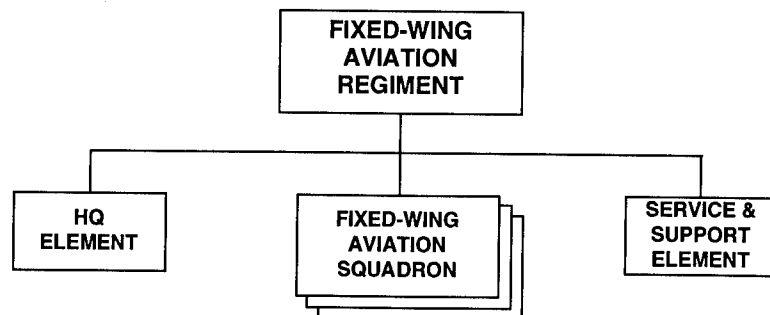


Figure 7-1. Standard fixed-wing regiment configuration.

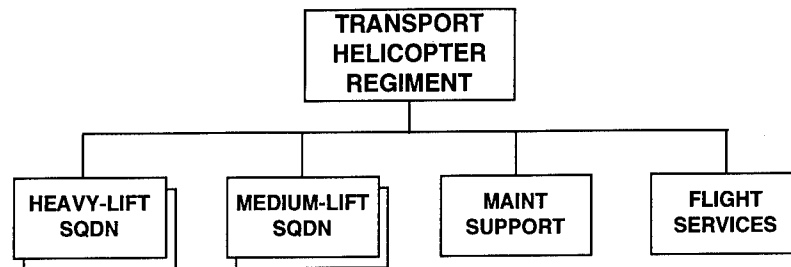


Figure 7-2. Transport helicopter regiment.

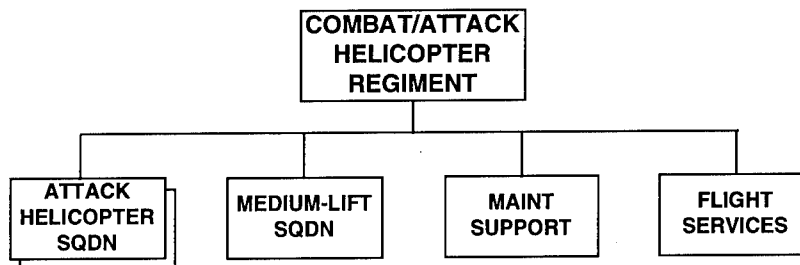


Figure 7-3. Combat/Attack helicopter regiment.

Command and Control

Like other branches of the services, the Air Force is subordinate to the General Staff, within the Ministry of Defense. The command and control structure facilitates close coordination and integration with ground forces. At military region or expeditionary army level, the staff contains a **chief of aviation**. Aided by his own staff, his function is to-

- Advise the military region commander on the capabilities and use of air power.
- Ensure aviation is integrated with the ground forces.
- Transmit requests for air support.
- Maintain communications with aircraft in the battle area.

The chief of aviation also advises the military region or army commander concerning target information derived through aerial reconnaissance.

Upon mobilization; the Air Force may also send an **aviation control element** to the military district level. A **forward air**

controller is assigned to maneuver brigades and division when fixed-wing aircraft or attack helicopters are allocated to their support. This liaison element, located with the supported unit's forward command post, consists of an Air Force officer, usually a pilot, and appropriate communications personnel. Its primary function is to provide a link between the ground and air elements, identify targets, and direct attacking aircraft to the target.

To ensure safe passage over friendly forces the OPFOR emphasizes strict adherence to predetermined flight paths and timing. Coordination with ground-based air defense systems is critical. This is accomplished through coordination with the Air Defense Command.

AVIATION EMPLOYMENT

When the State is attacked by a major power, the Air Force would defend the Capital District and conduct mass strikes early on to inflict politically significant damage on invaders. An invasion of the

State dictates an "all out" effort be initiated to expel the enemy. The Air Force adopts a "use it or lose it" attitude and uses all available assets before they can be destroyed. The OPFOR also disperses aircraft, helicopters, and other assets to enhance their survivability.

If engaged in a regional conflict, the Air Force attempts to establish and maintain **local air superiority**. Air superiority is established through a combination of offensive and defensive actions. Secondary missions include tactical air support, reconnaissance, transportation and logistic support, and insertion of troops.

Offensive air support operations involve attacks by air and/or ground forces against enemy Air Forces at their home bases. Defensive operations occur when enemy Air Forces have penetrated into the airspace of OPFOR maneuver elements or friendly territory. Defensive measures can achieve air superiority through the use of interceptors engaging the enemy in air-to-air combat or through the use of guns and missiles operating in a ground-to-air role. Defensive actions typically consist of a combination of airborne and ground-based forces. The achievement of surprise is stressed. The factors of speed, range, and flexibility inherent to modern Air Forces make them a particularly valuable contributor to surprising the enemy.

Air Superiority

The achievement of **local** air superiority is essential to operational and tactical success. The OPFOR would not initiate hostilities unless it is confident it can establish local air superiority for a specific period of time. OPFOR planners realize that this would be much easier to achieve in regional

conflicts than it would be when facing a major power. Offensive military operations would be preceded by a preemptive strike against the enemy's Air Force. This strike would most likely incorporate the efforts of fixed-wing air assets in conjunction with special operations units. The special operations units may have been pre-positioned in the vicinity of the target, or inserted by fixed-or rotary-wing aircraft. Targets include enemy airfields (with priority to the destruction of aircraft), vital command and control facilities, ground-based air defense systems, and logistics assets. The preemptive strike would probably be of short duration, executed with a high level of violence. Due to the precise coordination required, this operation would be planned and executed under the direct control of the General Staff. Upon achieving air superiority, air assets would be reallocated to the ground support role.

Ground Support

The OPFOR believes aviation forces significantly influence the outcome of the battle. The OPFOR emphasizes the capability of aviation to provide responsive aerial fire support using the followings principles:

- Attainment of air superiority.
- Coordination and integration with ground forces.
- Mass.
- Centralized control.

The OPFOR exercises strict, centralized control over its air assets. This allows the OPFOR to fully exploit the mobility and flexibility of air power. Strict centralized control enhances the planning and execution of surprise air attacks against the enemy. It also simplifies coordination among aviation assets performing different missions in the

same airspace, i.e., air defense, ground support, and reconnaissance.

Centralized control also allows the Air Force to widely disperse its aircraft to avoid destruction by the enemy's mass fire strikes, yet rapidly reconstitute the force to deliver massed attacks against the enemy.

The coordinated use of airspace over the battlefield and the delivery of ordnance in the close vicinity of friendly troops is extremely difficult. To reduce the problems associated with the coordinated use of airspace, OPFOR planners do not normally use helicopters, ground-attack aircraft, and artillery simultaneously in the same fire sector. Attacks by aviation and artillery may coincide in time, but occur in different areas.

Mission Categories

The Air Force recognizes the criticality of providing tactical air support to the ground forces. Available air support is divided into the following categories: **preplanned**, **on-call**, and **immediate**.

A **preplanned mission** is a mission planned well in advance of its execution, usually 24 hours prior to launch. Such missions are normally planned against static or non-moving targets with known locations.

An **on-call mission** is one in which the target may be predesignated, but the timing of the strike remains at the discretion of the ground force commander. These missions are normally planned to support maneuver forces not yet in contact with the enemy, but are expected to make contact once the aircraft are available. The on-call mission is planned the same as preplanned missions, with the exception of the attack's timing. A "window of availability", usually

no longer than 4 to 5 hours, is established. The mission can be launched at any time during that window. On-call missions are planned with secondary targets in the event the window of availability expires before the primary target becomes available for attack.

The Air Force designates aircraft to respond only to requests from ground commanders for unplanned **immediate air support**. A request for immediate air support is submitted by the ground commander to the next-higher headquarters and then forwarded through the chain of command. If a request for air support does not exceed the division commander's allocated sorties, he can order the strike through his aviation control element. As with preplanned support, the aviation control element at each command level participates directly in the evaluation of each air support request and in coordination with the strike mission.

The Air Force prefers to use **helicopters** for immediate, time-sensitive requests. The reduced logistics requirements of combat helicopters, compared to those of fixed-wing aircraft, very often allow deployment close to the main battle area which enhances their ability to respond to on-call missions. Helicopters have other advantages over high-performance aircraft, such as the ability to concentrate and maneuver undetected for a strike and the enhanced capability of helicopter pilots to evaluate more rapidly and exactly the battlefield conditions. The Air Force is concerned about the vulnerability of their helicopters to enemy ADA and enemy high-performance enemy fighters. They prefer to use helicopters in a ground support role within range of the air defense capabilities of the supported force.

Fixed-wing aircraft are used more frequently in attacks against previously re-

connoitered, static targets in the immediate operational rear or at greater depths. High performance aircraft are extremely vulnerable to terminal air defenses when executing a ground attack. This necessitates a low-altitude, high speed target approach and minimum time in the target area.

Levels of Combat Readiness

The OPFOR recognizes three levels of combat readiness for aircraft and crews. Aircraft in categories one and two respond to on-call missions. (See Figure 7-4.)

Planning and Preparation

Before an offensive operation, the General Staff issues orders establishing the objectives and goals. The Air Force determines the total number of ground-attack sorties it can generate daily. The General Staff then allocates appropriate resources to the expeditionary army. The army commander, in conjunction with his air staff and division commanders, determines the army air requirements. Using this information, the air staff formulates the air support plan for the army operation. The plan depends on the number and types of targets, flight distance, and the disposition of enemy air defenses. It divides support requirements between fixed-wing and helicopter resources. When the air support plan is developed and approved, it is integrated into the overall fire support plan. The General Staff approves the plan, allocates appropriate resources, and orders the Air Force to execute.

The Air Force issues orders to its operational units. These orders include targets, numbers of sorties, munitions, flight routes, communications, and mission timing. Air Force representatives at the army and division levels advise the respective command-

ers of the air support plan and how it will be implemented. Military regions engaged in defensive operations follow the same planning methodology as does the expeditionary army.

The Air Force retains strict centralized control of its air support resources throughout the tactical air support process. Ground commanders do not control aviation assets. Strict centralized control allows rapid reallocation of air assets to higher priority missions.

AIR SUPPORT IN THE OFFENSIVE

In addition to operations designed to attain air superiority at the onset of hostilities, OPFOR air doctrine calls for air support of ground troops engaged in offensive operations. Generally, this applies to expeditionary army offensive operations, districts conducting limited-objective attacks in support of the expeditionary army offensive, and military region or district counterattacks conducted within their defensive operations.

Air support in the offensive consists of four stages: **support for movement of troops, area preparation, direct support to ground troops, and air accompaniment**, which correspond to the phases of the fire support plan. The major differences between the phases is their time of employment, although there are some differences in targeting, command, and aircraft. While all stages of air support use both fixed-wing and helicopter assets during their execution, increasing numbers of helicopters enables them to play a greater role in the close support of ground forces. This frees fixed-wing aircraft to strike deeper targets.

<u>CATEGORY</u>	<u>CREW AND AIRCRAFT</u>	<u>DURATION OF READINESS</u>	<u>TIME BEFORE TAKEOFF</u>
ONE	Aircraft are fully serviced and armed. Combat crews are briefed on their mission and are in the aircraft ready to start engines. Ground personnel are assisting the combat crews.	1-2 Hours	3-5 Minutes
TWO	Aircraft are fully serviced and armed. Combat crews are briefed and are on standby in the vicinity of aircraft ready to take off within a specified short period of time after receiving a mission order.	2-4 Hours	15 Minutes
THREE	Aircraft are refueled and serviced. Cannons are loaded. External systems (bombs, rockets, missiles, fuel tanks,(etc.) are not loaded. Combat crews are designated, but not on standby;they have not been briefed on air and ground situation, but will be before takeoff.	2-4 Days	1-2 Hours

Figure 7-4 Levels of combat readiness.

Support Movement of Troops

Support for the movement of troops is intended to protect ground troops from air and long-range artillery fires as they move forward from assembly areas. During this stage, fighter-interceptor aircraft fly patrols to intercept and destroy any aircraft attempting to attack ground forces. Ground-attack aircraft strike deep to destroy aircraft and helicopters still at their home fields. This stage also targets long-range artillery that might strike at friendly troops while they are still far from the forward edge of enemy defenses.

Area Preparation

Area preparation takes place across a specified frontage prior to the beginning of

a ground offensive. It can be simultaneous with the preparation fire of both the artillery and missile units and requires close, detailed coordination with these forces regarding targeting and timing. Air strikes in the preparation phase generally extend no farther than the enemy's corps rear area. Depending on the combat situation, the duration of an air preparation can be from ten minutes to over an hour. Targets for fixed-wing ground-attack aircraft are those conventional artillery cannot destroy due to distance, mobility, or degree of "hardness."

Direct Support to Ground Troops

Direct support to ground troops begins after ground forces start an offensive and have made contact with the enemy. Its targets are at tactical and immediate opera-

tional depths and include weapons of mass destruction, fire support means, command and control systems, and enemy reserves. The majority of these strikes are preplanned; however, immediate air attack missions against centers of resistance are made at the request of ground force commanders within the limitations of their allocated resources. As in the area preparation phase, the targets generally are those beyond the destruction capabilities of artillery and missiles. Helicopters provide the majority of close support to ground troops during the offensive. However, fixed-wing aircraft may also be targeted against forces in contact with, or in the immediate vicinity of, friendly troops. The majority of air attacks during this stage are preplanned, although provision is made to allow for immediate attacks in response to requests from beleaguered ground forces.

Air Accompaniment

Air accompaniment occurs as OPFOR ground forces penetrate deeply into enemy defenses. The specific point at which air accompaniment begins is not clear, but it is during the advanced stages of offensive operations when the progress of the ground forces has outstripped the prepared fire plan, and/or outdistanced planned fire support, and reassessment and reallocation of air resources are necessary.

AIR SUPPORT IN THE DEFENSE

In the defense, air support is integrated into the overall defensive fire plan. The air fire support plan extends to the immediate operational depth of the enemy and seeks to disrupt his attack plans. Generally, defensive air operations support both the expeditionary army and military regions conducting defensive operations.

Several variants of the air fire support plan are developed in detail. Variants of the plan take into account the anticipated actions of the enemy and his most probable avenues of approach. An aviation **counterpreparation** is planned for each variation. The objective of the counterpreparation is to launch a powerful, surprise, concentrated strike of short duration to preempt the enemy's plan. The targets of the counterpreparation are:

- Artillery in firing positions.
- Aviation on airfields.
- Armor or mechanized forces preparing to attack.
- Major command and control centers, headquarters, and communications centers.
- River-crossing sites.
- Equipment, ammunition, fuel dumps, and logistics facilities.

Variants of the plan also provide for air strikes against attacking forces that are out of range of artillery and tactical rockets, and concentrated fire by all fire support weapons or forces that have reached, or penetrated, forward defensive positions.

Helicopters with ATGMs are employed to **counterattack** armored or mechanized forces. The helicopter force seeks routes that allow it to approach the flank of the enemy force undetected. If terrain variations do not provide adequate concealment for the force, smoke may be employed to conceal its approach. During **withdrawal**, helicopters support rear guard units by attacking advancing enemy units from ambush and by laying minefields.

AIR DEFENSE OPERATIONS

Air defense operations are critical when attempting to generate combat power.

They provide the OPFOR with protection from enemy air attack, prevent the enemy from separating friendly forces, and free the OPFOR commander to fully synchronize maneuver and firepower.

Air defense operations are performed by all members of the OPFOR; however, ground-based air defense artillery (ADA) units execute the bulk of the force-protection mission. These units protect deployed forces and critical assets by preventing enemy aircraft, missiles, and remotely-piloted and unmanned aerial vehicles (RPV/UAV) from locating, striking, and destroying them. Air defense operations focus on defending friendly forces and contributing to air superiority. The emphasis depends on whether or not the OPFOR has already been able to seize the initiative in the air and decimate the enemy air power.

Goal

The primary goal of the OPFOR air defense system is to protect the State and OPFOR ground forces from air attack. To accomplish this, an air defense complex incorporating airborne and ground-based weapons systems has been established. The air defense system is a single system consisting of two parts -- strategic and tactical. The **strategic** portion of the air defense system consists of assets directly subordinate to the Air Defense Command (ADC) which protect key areas in peacetime and wartime. Due to the ranges of these systems, forces defending within the State may benefit from their placement. The **tactical** portion of the air defense system consists of air defense units organic to the maneuver forces. These are mobile ADA elements assigned to combat units to provide short-range air defense.

Air Defense Phases

OPFOR air defense includes three phases. These phases may overlap, and all three may be conducted simultaneously.

The **first phase** includes all actions taken to destroy enemy aircraft while they are still on the ground at airfields or in marshaling areas. Air Force aviation and surface-to-surface missiles (SSMs) play the major role in this phase.

The **second phase** includes all actions taken to destroy enemy aircraft while still in flight but still at some distance from ground forces. Again, Air Force aviation plays a sizable role in these actions, and medium-range surface-to-air missile (SAM) units may also have some role

The **third phase** involves the destruction of enemy airplanes and helicopters that have penetrated into the airspace of the OPFOR maneuver elements. The third phase primarily belongs to tactical air defense forces.

COMMAND AND CONTROL

The ADC, subordinate to the Air Force, is responsible for all air defense. The Air Force is responsible for integration of all air defenses and establishment of air defense rules of engagement and other air defense procedures for all OPFOR air defense assets. Control of air defense operations is exercised through a national Air Defense Control Center with sub-centers located within several military regions. Air defense systems organic to maneuver units remain under the command of the maneuver commander but operate under general rules and policies established by the ADC. The ADC declares air defense alert stages, issues weapons sys-

tems readiness orders, establishes and defines air corridors, missile engagement zones, free fire zones, etc. The maneuver commander controls the disposition of organic air defenses and, with the recommendations of his supporting air defense unit commanders, plans for the air defense of his assigned sector. Identification friend or foe (IFF) and airspace management control procedures and issues are determined by the ADC.

Airspace Management

The OPFOR considers **airspace management** the most complex aspect of air defense operations. Because of the variation of air defense weapons in the OPFOR inventory, commanders are concerned with the division of airspace among the systems. The ADC is responsible for airspace management issues and procedures. Coordination between fighters and ground-based air defense systems is accomplished on the basis of zones of responsibility, delineated both horizontally and by altitude, or by the central distribution and assignment of specific targets to specific weapons. The latter is probably only applicable in a low-intensity air environment such as a conflict with neighboring states.

Typically, OPFOR airspace management procedures fall into the "if it flies, it dies" category. Aircraft and helicopter operations are coordinated with ground-based air defense by the establishment of egress/ingress corridors through air defense sectors for specific time periods. This becomes a "safe corridor" allowing the safe passage of OPFOR aircraft beyond the line of contact. The OPFOR may use these corridors in conjunction with time periods in which SAM units refrain from engaging aircraft unless directly attacked. The OPFOR

may also establish time periods to fire on all aircraft or on no aircraft. If the situation does not allow such control measures to be developed and disseminated in advance, air defense units in a given sector would probably be instructed to hold fire on all aircraft in a sector (unless attacked) to allow the safe return of OPFOR aircraft. Even with this simple "switch-on" (die)/"switch-off" (fly) policy for ground force's weapons, the OPFOR is likely to engage its own aircraft. The OPFOR prefers to engage some of its own aircraft rather than allow enemy aircraft to penetrate OPFOR defenses and attack the State.

Another method the OPFOR uses for airspace management is the establishment of a boundary parallel to, and well beyond the ground force's line of contact. This boundary is established out of range of organic SAMs. Fixed-wing aircraft would engage enemy beyond this boundary. Ground-based air defense systems engage aircraft out to this boundary.

Air Surveillance

Intelligence information needed by air defense units is divided into two basic categories. The first category represents data needed to plan and organize air defenses. It includes all data required to make a determination of probable enemy courses of action. Typical of information in this category would include the following:

- Composition and strength of enemy Air Forces.
- Technical and combat capabilities of enemy aircraft.
- Basic methods of tactical employment of enemy aircraft.
- Locations of airfields, command and control centers, and air logistics depots.

- Avenues of air approach.

The second category is **data required to conduct** the air battle. It includes all information necessary to determine the enemy's plans, air order of battle, and strike objectives as well as the exact location, numbers, direction, speed, and altitude of aircraft in flight. Developing the first category of information is the joint responsibility of all intelligence activities. The detection, surveillance, and control of intercept of enemy aircraft is the specific responsibility of air defense reconnaissance elements, particularly air defense radars.

The goal of the ADC is to establish an air surveillance network which ensures the earliest warning of air attack. Air surveillance is conducted by electronic and electro-optical means and by visual observation. Radars provide an all-weather capability. Normally, target information is passed from higher-level radar units to air defense commanders and firing batteries. This procedure reduces the vulnerability of radar units to detection by enemy forces and the likelihood of their subsequent neutralization by electronic countermeasures or destruction.

The OPFOR is well aware of technical advances in the development of electronic countermeasures and radar-homing missiles. It has made a concentrated effort to train air defense personnel to fight effectively against an enemy using electronic jamming and homing devices against their air defense acquisition equipment.

Information on enemy aircraft is passed over the target identification and warning network; command and support ra-

dio networks are used when necessary. Since the majority of target acquisition radars are located above military district level, most target information is developed at military region-, army- and National-level air defense control centers and passed down to the military districts, divisions and brigades. This allows commanders to select the best weapon to engage a particular target. Ideally, only those aircraft positively identified as enemy would be engaged. Air and air defense control centers and command and control facilities are colocated whenever possible to provide the highest degree of coordination between air defense and aviation activities.

STRATEGIC AIR DEFENSE

Strategic-level air defense consists of air defense brigades and regiments, augmented by Air Force fighter-interceptor regiments. (See Figure 7-5.) The air defense brigades are equipped with surface-to-air missile (SAM) systems, and air defense regiments are equipped with antiaircraft (AA) guns. Either type unit is supported by a network of surveillance and fire control radars. Antiaircraft guns provide defense for missile sites and critical components of the national structure against aircraft which may penetrate other defenses.

Fighter-interceptor aircraft provide long-range defense across the entire airspace and are closely controlled to prevent instances of fratricide. The strategic air defense system is also responsible for long-range engagement of aircraft posing a threat to maneuver forces.

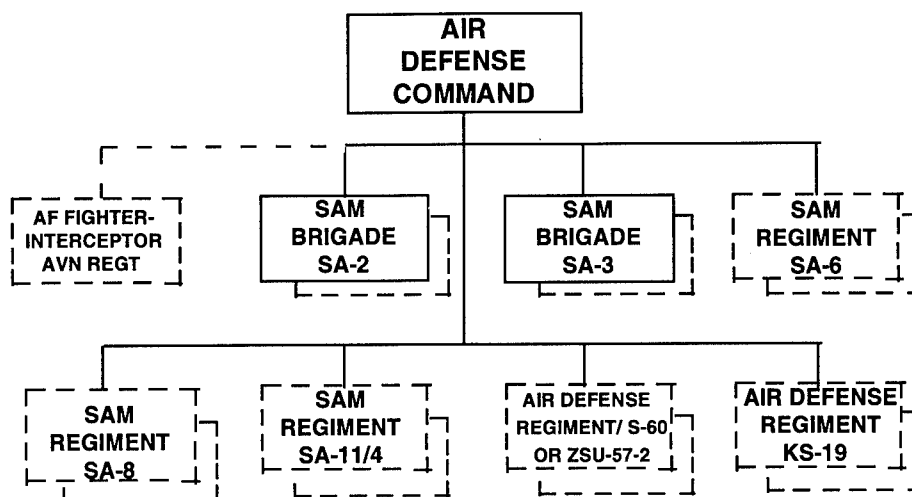


Figure 7-5. Air defense command structure.

Missions

The primary mission of the strategic system is to provide air defense for the State. This is accomplished by providing point defense of vital population centers, government facilities, major industrial centers, military installations, and logistics bases.

The secondary mission is to provide air defense coverage for military regions conducting defensive operations within the State. Since air defense assets are positioned to fulfill their primary mission, the ability to provide coverage to ground forces depends on the positioning of defending forces.

Assets

Unit types depicted below fall into two categories: those which the ADC controls in peacetime and wartime, and those which the ADC allocates to ground forces during the transition to war.

Medium-range, high-altitude air defense coverage is provided by the SA-

2/GUIDELINE system (Figure 7-6). These SAM systems provide semi-fixed point defense. The SA-2 is a national-level asset usually found in the rear area with the mission of providing a point defense of static assets such as cities, or critical government and military facilities, and possibly serving as a barrier defense along major avenues of approach to the Capital City. Each missile is mounted on a towed trailer and must be transferred to a ground-mounted launcher for firing. The typical SA-2 site consists of six missile launchers emplaced around a fire control radar.

The SA-3/GOA serves as a complement to the high-altitude capabilities of the SA-2s. As with the SA-2 units, SA-3 units are considered national-level and are not subordinate to the ground forces. The SA-3 is principally a point/small-area defense weapon providing short-range, low-altitude defense. Along with the S-60 and other AA guns, it may provide low-to-medium-altitude air defense of critical rear area assets, major cities, and high-value military facilities such as regional logistics bases. Neither the SA-2

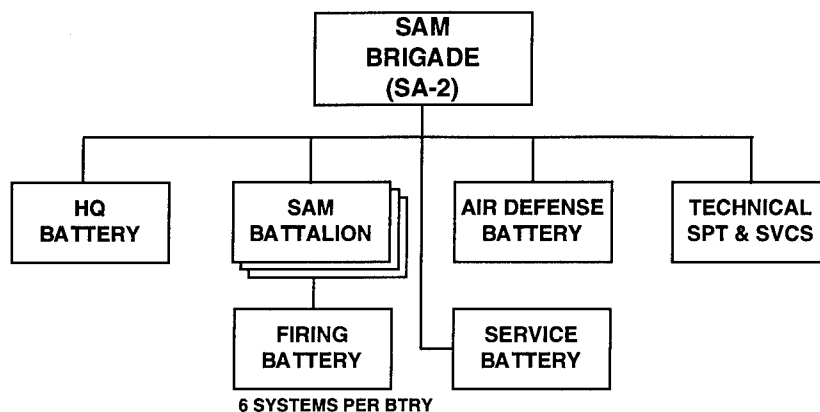


Figure 7-6. SAM brigade (SA-2).

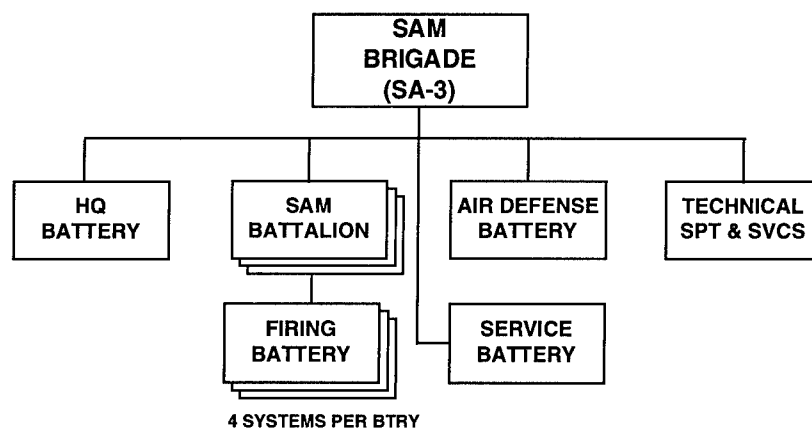


Figure 7-7. SAM brigade (SA-3).

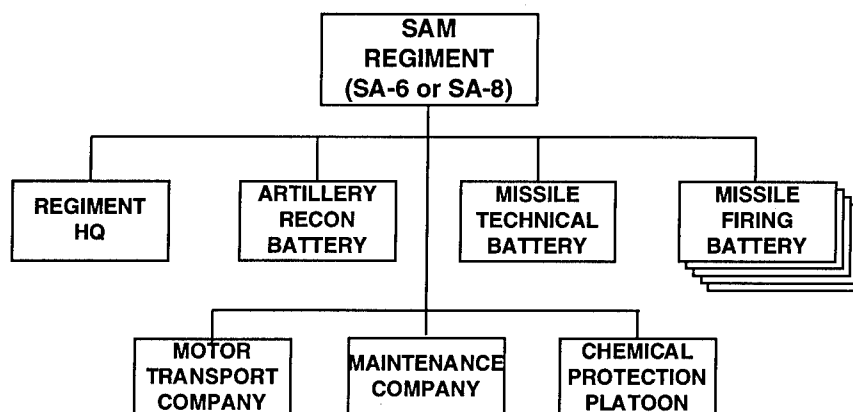


Figure 7-8. SAM regiment (SA-6 or SA-8).

The SA-6/GAINFUL is a low-altitude SAM. Although considered a national-level system, due to its excellent mobility it may be allocated down to military districts or maneuver divisions. It may also provide point defense of the semi-fixed SAMs.

The SA-11/GADFLY is a low-to-medium-altitude SAM. It provides air defense against high-performance aircraft operating at low-to-medium altitudes, as well as cruise missiles. The SA-11 is considered a national-level system and has replaced some of the older SA-4 systems still in the inventory.

The S-60 is a short-to-medium range single-barrel 57-mm AA gun system. It is present at the national-level or in the air defense regiment of divisions and military regions. The S-60 provides point defense around airfields, SAM sites, supply depots, and fixed installations. The air defense regiment also has a battery of SA-7/14 shoulder-fired SAMs for close-in air defense.

The ZSU-57-2 has the same characteristics as the S-60 except it has twin barrels, is mounted on a modified T-54 tank chassis and is not radar-controlled. It is present at the national level or in the air defense regiment of divisions. Functions are the same as the S-60.



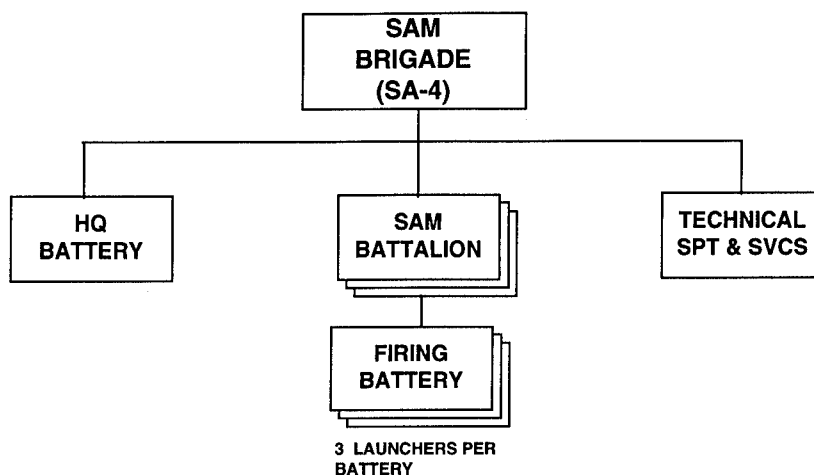


Figure 7-10. SAM brigade (SA-4)

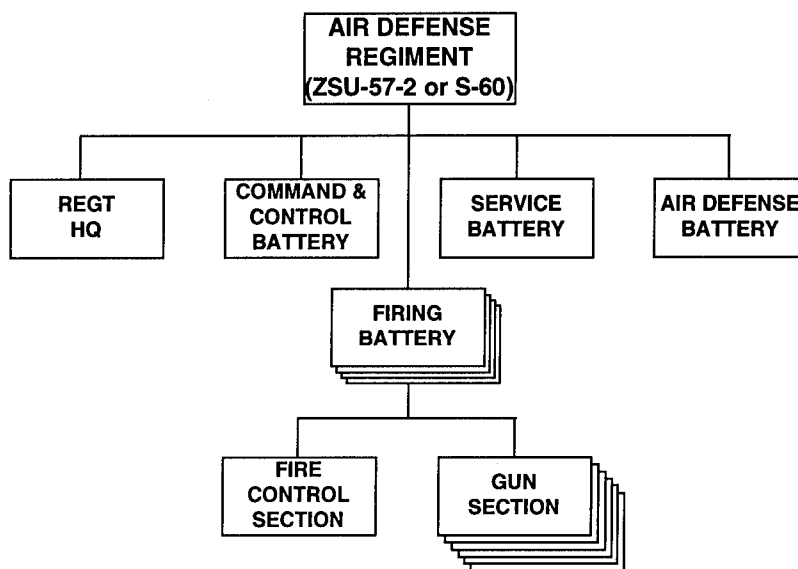


Figure 7-11. Air defense regiment (ZSU-57-2 or S-60).

The KS-19 is a short-to-medium-range single-barrel 100-mm AA gun system. It provides point defense around airfields, SAM sites, supply depots, and other fixed installations.

Employment

The General Staff attempts to follow the same "tailored support" methodology with the ADC and its subordinate units

which it follows when allocating assets to ground forces. The broad range of unit types subordinate to the ADC allows for this type of support. In peacetime, many strategic ADC units are deployed in accordance with their wartime missions. Specific protection requirements of the city, facility, or installation determine the number and type of units deployed.

Ground forces may receive coverage from these strategic air defense units, but this is largely circumstantial. For example, brigades defending within a military district may fall within the umbrella provided by SAM units protecting a major city nearby. Support to the ground forces is a secondary mission.

TACTICAL AIR DEFENSE

Mission

The mission of tactical OPFOR air defense is to prevent enemy air action from disrupting the actions of ground forces. This can be achieved by destroying enemy aircraft or by forcing them to expend their ordnance before reaching their targets.

Assets

The OPFOR inventory of tactical air defense weapons include a variety of missiles, guns, and support equipment. There are air defense weapons at nearly every echelon.

Most military districts have an organic air defense regiment equipped with low-to-medium-altitude self-propelled SAM. Each air defense regiment also has towed antiaircraft guns assigned for point defense. Generally, the missions of these units are to augment maneuver brigade air defenses in the forward areas and to engage and destroy any aircraft that get through brigade defenses and threaten command and support elements. The mixed deployment of the SAMs along with the antiaircraft guns gives the military region and military district commanders an organic means to establish a local area defense.

Mechanized infantry and tank brigades primarily have self-propelled antiaircraft guns, while light and motorized infantry have towed or truck-mounted systems. These are normally deployed to provide maneuver forces with air defense protection against ground-attack aircraft and helicopters. The regiments depicted at Figures 7-9 and 7-10 can be found at division-level and higher.

Air Defense Planning

Maneuver commanders plan 360-degree air defense coverage. They must consider how their air defense planning affects not only the battle in their sector, but adjacent sectors as well as rear area protection. In his sector, the commander may order a higher state of air defense alert or a more restrictive readiness status than that issued by the ADC, but under no circumstance can he relax the proscriptions of the ADC. Air defense units organic to maneuver forces monitor the air defense early-warning network to maintain current information on air threats affecting their sector and for changes in the alert status. In the event of a communications failure or the destruction of the air defense control center, all air defense systems would engage any aircraft positively identified as enemy.

Tactical Concepts

OPFOR tactical air defense is based on two basic concepts. First, air defense is an integral part of the ground forces. Second, air defense of ground forces is achieved by a variety of weapons and equipment integrated into a coherent air defense system.

Tactical Principles

The basic principles that have influenced tactical air defense developments and formed the OPFOR tactical air defense doctrine are the following:

- **Firepower.** The OPFOR use a variety of defense weapons, both missiles and guns, and a force structure that provides a significant number of these weapons, with a suitable mix of capabilities to ground force commanders.
- **Surprise.** The OPFOR is aware of not only the physical destruction that can be achieved by an attack on an unsuspecting enemy, but also of the psychological effects of violent and unexpected fires on aviation crews. The psychological effects often are only temporary, but they can reduce the effectiveness of attacking air crews at critical moments.
- **Mobility and maneuver.** The OPFOR mobile tactical air defense systems allows air defense units to maneuver with tank, mechanized, and motorized forces.
- **Aggressive action, initiative, and originality.** Air defense commanders realize they must exploit the full capabilities of their equipment if they are to carry out their missions successfully. This demands aggressive action, initiative, and originality on their part. The battlefield is a fluid and volatile environment. Air defense commander must be responsive to changes in the tactical situation. They must also be aware of changes in the tactics employed by enemy Air Forces.
- **Coordination of actions between supported maneuver units and supporting air defense units and**

between air defense units. This principle emphasizes the OPFOR view of air defense as a single system and an integral element of the ground battle.

- **360-degree security.** The OPFOR recognizes that air attack can come from any quarter and that it is not enough to provide security for only the units close to the forward edge and only in the direction of enemy forces.

Deployment

Guidelines for the deployment of air defense units depend on the assessment of the air threat, terrain, mission, and tempo of operations. The shape of the air defense deployment can change as formations move from the march into meeting engagements/battles, conduct attacks from a position of close contact (including forced river crossings), or conduct pursuit. The most common methods are the following:

- When the air threat is low, lines of deployment may be assigned to be occupied in succession by the complete air defense unit. When a division is to attack with detailed preparation, much of its air defense would deploy in advance to cover its division artillery group and lines of deployment into prebattle and battle formation.
- When the air threat is continuous, fire units may leapfrog forward into successive fire positions, maintaining continuous coverage of supported units.
- In a highly mobile, fragmented battle, air defense may be integrated into combat groupings and temporary firing positions on less likely ap-

proaches or in gaps between the coverage of the main defenses.

Air defense assets at army and below are generally positioned rearward from the forward edge by approximately one-half to one-third of their engagement range. An exception to this rule of thumb would be the long-range SA-4/GANEF SAM system. SA-4 firing batteries are sited to augment coverage of forward combat units and provide coverage of key facilities in the army rear area. In either case they would probably locate considerably less than one-half their range from the forward edge. The same is true of the shortest-range SAMs and AA gun systems.

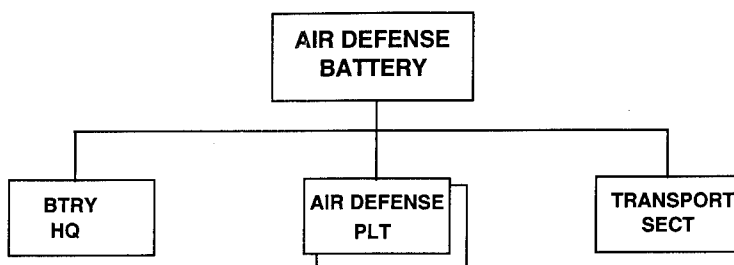
The employment of the division air defense regiment is determined to a large degree by the type of weapon with which it is equipped. Air defense regiments equipped with the S-60 gun cannot provide comprehensive coverage of the entire division simultaneously. They are capable of only a limited area defense and are much better suited to protect individual locations. Single S-60 gun batteries are employed to augment the air defense weapons of selected maneuver brigades or to protect selected sites such as river crossings or command posts. Within its range capabilities, the S-60 is an extremely lethal weapon.

Air defense regiments equipped with either the SA-6/GAINFUL or the SA-8/GECKO SAMs are capable of a true area defense. They can include all elements of the division within their engagement envelopes. Typical employment of the regiment's five missile firing batteries might involve one battery providing support directly to each first-echelon maneuver brigades, while the remaining batteries provide protection for the division headquarters, artillery units,

and the remainder of the division. Units to the rear of first-echelon brigades benefit from the protection provided by the first-echelon brigade's organic air defense weapons and the missile batteries directly supporting them. The range of the SA-6/GAINFUL and the SA-8/GECKO allows both of these missile systems to be deployed several kilometers behind the forward edge, thus reducing their exposure to enemy ground-based weapons. From these positions, the missile batteries can still engage targets well beyond the forward edge. The range of the SA-6/GAINFUL provides for greater depth in the division's air defense system, especially against aircraft employing standoff weapons. While the range of the SA-8/GECKO is significantly less than that of the SA-6/GAINFUL, its higher road speed and amphibious capability make it especially well suited for employment in pursuit or exploitation operations.

Brigade organic air defense assets consists of an air defense battery. Typical employment of brigade air defense assets includes allocation of two, or four ZSU-23-4s to protect the brigade's lead battalions or first echelon. One platoon consists of four ZSU-23-4s. The ZSU-23-4s are normally employed in pairs, for both effective command and control and mutual support. Individual systems are most frequently kept within several hundred meters of one another. When employed as a platoon, ZSUs are usually deployed in pairs approximately 1,500 meters apart, again insuring mutually supporting fires.

The four SA-9/GASKIN systems are employed as a group. They would most likely be deployed between the first and second echelons of the brigade, a location from which the SA-9s can protect both first-and second-echelon units without becoming



NOTE:

The brigade air defense battery generally consists of two ZSU-23-4 platoons. Some units may have one SA-9/GASKIN platoon (4) and one ZSU-23-4 platoon (4).

Figure 7-14. Air defense battery, mechanized infantry brigade

exposed to enemy direct fire weapons. The SA-9s are probably tasked to provide coverage of the brigade command post, the brigade's organic artillery battalion, and other organic or attached elements located in the brigade's sector.

The SA-7/14s of the mechanized infantry battalion are usually employed as a section under the direct control of the battalion commander. The SA-7/14s are deployed near the battalion command post so that the battalion commander can control their fire by voice and visual signals in the event of radio communications failure. In some situations, such as in a prepared defense, the brigade commander may direct and control the employment of the SA-7/14 gunners. SA-7/14 gunners form a composite fire element under the control of the ZSU commander.

SUPPORT IN THE OFFENSE

Unless protected, ground forces engaged in an attack may be subject to intense air attack. Attacking formations must operate with minimal cover, concealment, and camouflage. The enemy relies heavily on air power to destroy these formations because they are lucrative targets. As a result of this

vulnerability, the OPFOR stresses the criticality of air defense cover during the attack.

Allocation of air defense units is weighted in favor of maneuver units in areas where the threat is perceived to be the greatest. For example, an infantry brigade in the division's first echelon usually receives additional air defense support from the division's air defense regiment. Assets allocated to subordinate units would join the unit to which attached in pre-attack assembly areas. They provide cover while in the assembly area, on the march, and during the attack. When the second echelon is committed, priority of air defense shifts to those forces.

Deployment of air defense units supporting an offensive operation depends on an assessment of the air threat, terrain, tempo of supported formations, and mobility of supporting systems. If the supported unit attacks on a broad frontage, the guns or SAMs usually deploy in a line formation to protect dispersed elements of the formation. If the unit attacks on a narrow frontage, the air defense systems deploy in column, thus providing increased concentration of fires.

In the offense, the exact location of air defense weapons depends on the following factors:

- The mission of the supported unit.
- The commander's chosen attack formation.
- The terrain, fields of fire, and observation.

Air defense guns and SAMs normally deploy at distances of one-third to one-half their effective range behind the troops being supported. They set up to provide interlocking and mutually supportive fields of fire with separation distances to reduce the likelihood of simultaneous destruction by conventional weapons. Man-portable SAM gunners ride with the infantry in mechanized and motorized units.

Air defense elements supporting attacking units maintain communications with the brigade air defense unit or the air defense regiment from the division or military district. They also monitor the air defense target identification and warning network. These communications links provide the firing units with information regarding the probability of air attack.

SUPPORT IN THE DEFENSE

The allocation of air defense assets supporting the defensive closely parallels that of the offensive. The OPFOR recognizes some differences in the nature of air threats to forces engaged in defensive operations. While the principle threat to troops engaged in offensive operations is air strikes by low-flying ground-attack aircraft and armed helicopters, the additional threats of aerial reconnaissance and air assaults apply to troops involved in the defense.

Air defense units supporting the defense must coordinate fires between all air defense units and support maneuver units.

This provides an integrated air defense network.

The positioning of air defense assets is primarily based on air avenues of approach. Air observation posts are established on terrain affording good visibility or along avenues of approach. Sectors of observation and fire are established to insure 360-degree surveillance of the airspace surrounding the defensive area, because air attack can come from any direction.

AIR DEFENSE AMBUSHES

OPFOR commanders employ air defense ambushes and roving units to cover gaps in defenses, to provide coverage of less likely avenues of approach, and to deceive the enemy as to dispositions of air defenses. Air defense ambushes and roving units are often used when the OPFOR feels there is an inadequacy of air defense assets.

Air defense **ambushes** are most frequently positioned along **less likely but possible approach routes** for enemy aircraft. They usually consist of one or more guns or man-portable SAMs. In extreme cases, top-of-the-line SAMs such as SA-8/GECKOs may be used in the ambush role.

Units conducting ambush operations normally maintain radio silence and rely on external sources for early warning information. They monitor their radios to receive tip-offs about incoming aircraft from active target acquisition radars. Radar elements from the division air defense regiment support units operating from ambush. The tip-offs may provide type, height, direction, and speed. Once the height, direction and speed are known, the ambush unit can determine when to turn on its organic radar. Its radar is turned on only long enough to engage the

enemy. The ambush unit would relocate immediately after each engagement or if discovered by the enemy. If the ambush unit does not have the capability to receive tip-offs, it may rely on visual means to acquire the aircraft.

Employment of **roving air defense units** is similar to that of ambushes. The major difference is that, while an ambush lies in wait for the enemy to approach, a roving unit moves to the **most likely area** of enemy attack and occupies a series of pre-designated positions. These positions are identified by the commander of the roving unit during his terrain reconnaissance and coordinated with the maneuver commander. The positions are occupied according a pre-arranged schedule and on the order of the air defense commander.

Chapter 8

Combat Support Operations

Combat support operations encompass all methods of fire support, air defense, reconnaissance, radioelectronic combat, engineer support, NBC, and smoke operations. Since fire support and air defense operations have been covered separately, this chapter addresses the balance of those combat support functions.

RECONNAISSANCE

The OPFOR considers reconnaissance the most important of the combat support functions. Without an integrated reconnaissance effort, the operational and tactical actions of field commanders cannot be successful. At all echelons, OPFOR commanders and their reconnaissance staffs devote great effort to all forms of reconnaissance. These efforts include not only their standard, organic reconnaissance assets, but also infantry subunits, the militia, and the civilian populace at large.

Principles

Seven principles guide OPFOR reconnaissance efforts. These general principles, common to many armies, are reflected in OPFOR plans and execution at all echelons.

Focus

Reconnaissance assets must be integrated into a coordinated effort that utilizes assets to their maximum potential. This effort, above all else, must satisfy the com-

mander's intelligence requirements. Missions must focus on specific objectives. Reconnaissance staffs develop comprehensive plans, focusing on the commander's stated requirements. Organic assets are tasked to fulfill these, based on their capabilities. Support from higher headquarters is requested to fulfill requirements that cannot be satisfied by organic assets. Reconnaissance assets must remain focused on the most critical areas of the battlefield. For example, standard reconnaissance troops may coordinate with militia forces or civilians located in villages to provide point observation along less probable avenues. This allows the standard reconnaissance forces to focus their efforts on the most probable avenues.

Continuity

Continuous operations by reconnaissance assets allow uninterrupted coverage of the enemy situation and prevent surprise. OPFOR reconnaissance units attempt to maintain contact with the enemy at all times. Ideally, this is 24-hour-a-day coverage in all weather conditions, whether the given sector or zone is active or quiet. To ensure this continuity, the OPFOR attempts to provide overlapping coverage using a wide variety of resources, ranging from fixed-wing Air Force assets to the civilian populace.

Aggressiveness

Aggressiveness is the continual, vigorous search for information. Commanders and reconnaissance staffs use all means at

their disposal to gain information using their organic capabilities. They attempt not to rely on information from their higher headquarters. Reconnaissance missions, by their very nature, demand initiative, daring, and flexibility to be successful. Although reconnaissance through observation is the primary technique for gaining information, certain missions may include combat actions, such as raids and ambushes. Commanders and reconnaissance staffs, therefore, must constantly weigh the importance of the information to their operations against the potential loss of their assets in the attempt to gain it.

Reliability

Commanders base their decisions on reconnaissance information. Therefore, it must portray the true enemy situation. OPFOR commanders also understand that the enemy would have a strong counter-reconnaissance effort to deny them information. This enemy effort would include deception, concealment, and the physical destruction of OPFOR reconnaissance assets. Reconnaissance planners attempt to ensure overlapping acquisition means, especially on the main axis. This allows them to overcome enemy counter-reconnaissance by comparing and cross-checking the reports from various sources.

Accuracy

In addition to the basic reliability of the source, the information must be reported accurately and completely. At the tactical level, this rests largely on the shoulders of individual soldiers in reconnaissance units. For this reason, the best soldiers within infantry units are normally assigned to supporting reconnaissance units.

Timeliness

Timely battlefield information is critical. Due to the high tempo of the modern battlefield, information quickly becomes outdated. Timely reporting allows the commander to make adjustments to his plan, exploit vulnerabilities, and gain the initiative. Although increasing automation capabilities aid in achieving greater timeliness, OPFOR commanders still gain most of their information from ground reconnaissance and troop units.

Secrecy

The scale and focus of reconnaissance efforts along given axes or against specific objectives must be disguised to the greatest extent possible. If the patterns and weights of reconnaissance efforts are discovered by the enemy, his analysis may compromise the OPFOR commander's plan. Therefore, deceptive measures taken within the context of the reconnaissance effort include actions to conceal or exaggerate to mislead.

Reserves

Most echelons retain a reconnaissance reserve to respond to unforeseen taskings or reinitiate efforts on failed key missions. This is accomplished better within maneuver units than within highly specialized units, such as Air Force squadrons. At the tactical level, this may be done by using regular infantry subunits for the initial reconnaissance and saving the trained reconnaissance troops for refinement of initial efforts.

Strategic Reconnaissance

The OPFOR defines **strategic reconnaissance** as the measures taken to acquire and analyze information about the political and military situation in individual countries deemed as enemy, as well as other countries which may form coalitions with them. It supports national goals and strategic military operations by providing information needed by the MINDEF and the General Staff. For peacetime planning purposes, this includes the potential enemy's military, industrial, and economic potential, as well as the current disposition of his forces. The highest priority during peacetime is to provide indications and warning of impending hostilities. During wartime, priorities include providing military region or expeditionary army commanders with intelligence which they would not be able to obtain with organic assets, or with assets allocated to them by the General Staff. This normally includes the enemy's division and higher headquarters and communications centers, general support artillery groups and their command and control, and major operational-strategic groupings of forces and their movements.

Agents

Agents and special operations troops provide the two primary methods of obtaining human-source intelligence (HUMINT). Agents operated by national agencies or directorates conduct strategic reconnaissance, targeting political systems, national economies, and military developments. Much of their collection is systematically gleaned from open-source publications. They also conduct espionage, primarily within their geographical region. Agents operating within the geographical region also focus on military information at the operational level,

such as troop movements and new equipment issues. Some agents, such as those from the Directorate of State Security, may operate within the boundaries of the State. Operating from offices within the regions and districts, these agents provide general support to both offensive and defensive operations. As a directorate of MININT, they are subordinate to MINDEF during wartime. Usually, they are tasked to fulfill specific intelligence requirements which traditional military resources cannot. They attempt to use commercial communications means to report, such as phone or mail. They have radios, but use them only as a last resort.

Directorate of Military Intelligence

This directorate, subordinate to the General Staff, has three subcomponents which directly support the military: an operations battalion, radio reconnaissance battalions, and reconnaissance and radioelectronic combat (REC) battalions.

Operations Battalion. Functions of the operations battalion include special information (propaganda), counter-intelligence (both overt and covert collection), and interrogation. Counter-intelligence personnel provide an interface with Directorate of State Security personnel, discussed above. Elements from each of these disciplines are tailored into platoon- and company-sized teams, which are then allocated to military regions. Priority of support is to an expeditionary army conducting offensive operations, then to regions conducting defensive operations. The region normally allocates these assets to the main effort, in both offensive and defensive operations.

Radio reconnaissance battalions. Composition and equipment strengths vary for these battalions, but the standard

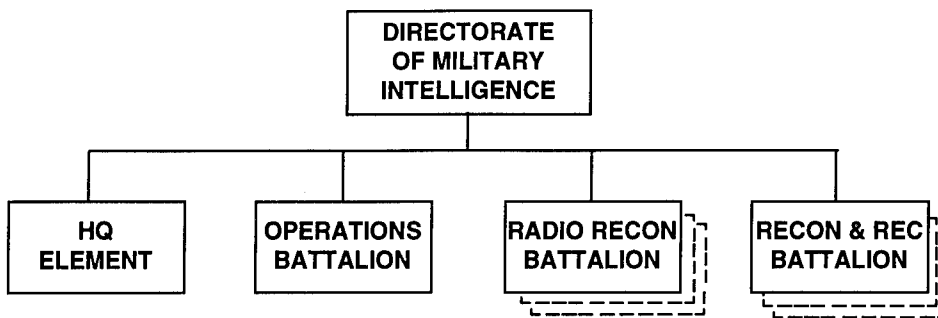


Figure 8-1. Directorate of military intelligence.

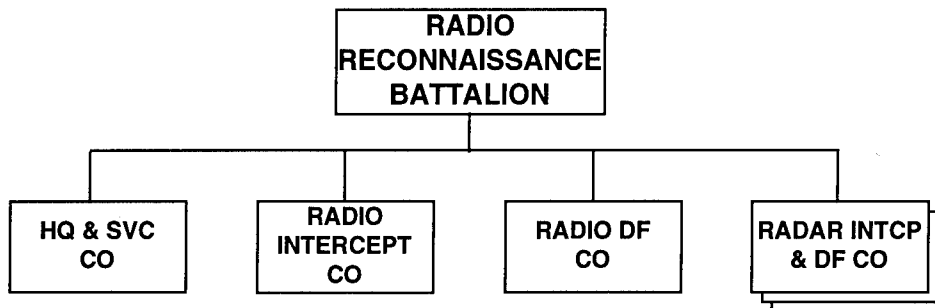


Figure 8-2. Radio reconnaissance battalion.

includes one radio intercept company, one radio direction-finding (DF) company, and three radar intercept and DF companies. The radio intercept company provides communications intelligence (COMINT) through the interception of enemy communications. Radar intercept assets provide electronic intelligence (ELINT) through the interception of radar signals. Direction-finding assets support both disciplines by locating the sources of both communications and non-communications emitters. These battalions may be allocated as a whole to support a military region or army, or individual companies may be allocated to them to support specific operations or fulfill specific asset shortfalls. The latter case would be more probable when the region has sufficient ground reconnaissance assets, but lacks the radio-electronic capabilities of the reconnaissance and radioelectronic combat (REC) battalion. Support priorities are to an ex-

peditionary army conducting offensive operations, then to regions conducting defensive operations. Of defending regions, the priority is to the region where the main enemy attack is expected.

Reconnaissance and Radioelectronic (REC) battalions. Composition and equipment of these battalions is identical to the battalions organic to some military districts and all infantry division structures. This includes two reconnaissance companies, one reconnaissance assault company (long range employment capability), one radio and radar reconnaissance company (intercept and DF capability), and one REC company (communications jamming capability). REC is addressed separately later in this chapter. These battalions may be allocated to military regions during wartime. Priority of support is the same as above for radio reconnaissance battalions.

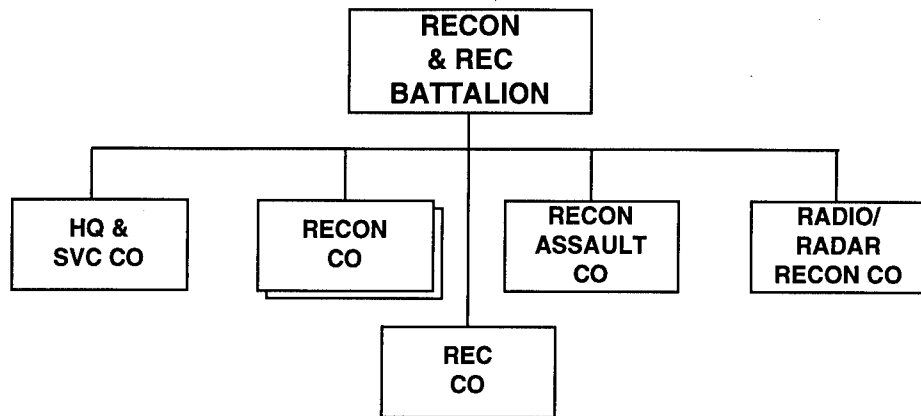


Figure 8-3. Reconnaissance and radioelectronic combat battalion.

Special Operations Command

The Special Operations Command is composed of special operations brigades and commando battalions. Special operations brigades, or their subordinate battalions, are not normally allocated to military regions. Their strategic employment in offensive operations, however, directly supports the expeditionary army. Commando battalions may be allocated to regions or subordinate districts, but for the primary purpose of conducting counterinsurgency operations. In case of an invasion, their secondary missions include a variety of direct action and training missions. Reconnaissance is expected from both during the course of any mission. A complete discussion of their missions, to include reconnaissance, is in Chapter 10, Special Operations.

Air Force

The Air Force conducts aerial reconnaissance through observation with both fixed-wing and rotary-wing platforms. In effect, all OPFOR pilots conduct reconnaissance missions. Visual observation is important, because crew members can interpret what they see and radio this information to

ground forces in real time. All commanders cannot rely on this support, however, for two reasons. For the majority of air missions, air superiority is a necessity. Also, the priority of combat missions is to offensive operations, which do not directly benefit the commanders of defending forces.

The Air Force has several units with a specific reconnaissance mission. Fixed-wing assets include independent reconnaissance aviation regiment(s); their platforms include a variety of photographic and side-looking airborne radar (SLAR) capabilities. These platforms usually support operations by flying in pairs of aircraft at low levels. Priority of support is to expeditionary armies conducting offensive operations, then to regions conducting defensive operations. Rotary-wing assets include photoreconnaissance helicopters organic to some combat/attack helicopter regiments. Priorities of support are the same as for fixed-wing assets.

Navy

Naval assets are responsible for sea and coastal surveillance. For purposes of reconnaissance, their assets are never allo-

cated to ground forces. Naval reconnaissance support to offensive or defensive operations is incidental.

Operational Reconnaissance

The OPFOR defines **operational reconnaissance** as the measures taken to acquire and analyze information about an actual or probable enemy and the area of combat operations, in order to prepare for and conduct combat operations. Operational reconnaissance supports an expeditionary army conducting either defensive or offensive operations, and military regions conducting defensive operations within the boundaries of the State. These forces conduct operational reconnaissance with assets allocated by the General Staff, their organic assets, plus the resources of their subordinate districts/divisions. The scope and depth of operations is situationally dependent, but generally extends through the width and depth of the enemy's corps or army group area. Operational reconnaissance priorities are:

- Indications of hostilities.
- Major operational-strategic groupings and their movement.
- corps/army group and divisional headquarters and communications facilities.
- Air defenses, including radar systems and command and control facilities.
- The contents of airfields and aviation forward operating bases.
- Major concentration areas of reserves and logistics.
- Boundaries.
- Location and extent of defended areas.
- Enemy's order of battle, equipment, and combat capabilities.

Since much of the region's or army's reconnaissance capability comes from General Staff allocations already discussed, the paragraphs below address only points specific to employment at that echelon.

Agents

Agents from the Directorate of State Security can provide general support in both offensive and defensive operations, if the operations are conducted within the region or district. Their taskings come from MINDEF, the General Staff, MININT, and their directorate headquarters, in that order. Field commanders do not have tasking authority over them. However, their headquarters may direct them, for the sake of timeliness, to report findings concurrently to them and the field commander requiring the information.

Directorate of Military Intelligence

The directorate's three subcomponents, already described under "Strategic Reconnaissance," allocate assets to the expeditionary army and other regions. They perform the following functions at this level:

Operations battalion. Counterintelligence and interrogation teams support all operations. If retained by the region or army, the reconnaissance staff at that echelon provides their taskings and mission guidance. In both offensive and defensive operations, teams can be attached to first-echelon districts or divisions for more timely exploitation of captured personnel and materiel.

Their priorities in **offensive** operations include--

- Location, size, composition, and direction of enemy force movement.
- Enemy objectives.
- Locations of engineer work

Their priorities in **defensive** operations include--

- Location, types, and disposition of enemy forces, including reserves.
- Enemy unit objectives.
- Location of the enemy's main attack.
- Enemy weaknesses and vulnerabilities.
- Enemy tactics and intentions, to include use of NBC weapons.

Radio reconnaissance battalions.

Regions or armies receiving these battalions either retain control at that echelon or allocate them to subordinate districts or divisions.

In **offensive** operations, the battalion's assets locate with the division conducting the main attack. By coordinating with the reconnaissance staff at that echelon, continuous coverage of the most critical sections of the battlefield is ensured. Alternate positions having line-of-sight (LOS) along the avenue of approach are selected. This enables the assets to leapfrog forward to support the operation. **Radio intercept** priorities include reconnaissance command and control nets; tank communications; maneuver force command and control nets; artillery, fire support, air defense, NBC, and engineer nets. **Radar intercept** priorities include surveillance, countermortar, counterbattery, and air defense radars in both the covering force and main defensive area, as well as other noncommunications jammers. **Direction-finding** priorities are to locate the sources of both voice and radar intercepts.

In **defensive** operations, the battalion coordinates positioning of assets with the reconnaissance staff. Initially, assets may locate within the security zone, forward of the defensive zone where the main attack is expected. The depth to which they position depends on the terrain and disposition of forces in the security zone. Ideally, assets position behind those forces in their initial positions. As security echelon forces fall back to their successive positions, radio reconnaissance assets fall back to previously reconnoitered positions offering good LOS. If deployed within the main defensive area, assets position behind the first-echelon battalions of the first-echelon brigades. They position on terrain offering good LOS and reposition frequently, even within the main defensive area, to avoid enemy electronic warfare activities and subsequent destructive fires. Priorities for defensive operations are the same as for the offensive.

Reconnaissance and REC battalions. Regions or armies receiving these battalions either retain them or allocate them to subordinate districts or divisions. Positioning and mission priorities for intercept and DF assets are the same as for the radio reconnaissance battalions. Jamming assets, normally positioned at the forward edge of the main defensive area, selectively jam critical communications links. In the security zone, priority is to enemy reconnaissance nets. As the enemy approaches the main defensive area, priorities shift to divisional and brigade-level fire support and maneuver nets, in that order.

In **offensive** operations, the battalion's ground reconnaissance assets could operate to a depth of 150 km or more. They concentrate on the army's main axes of attack. The reconnaissance assault company, also known as the long-range reconnaissance

company, operates in single vehicles, in small patrols of two to three vehicles, or dismounted teams of five to six men. These teams can enter the enemy rear area by helicopter, parachute, vehicle, or on foot. The reconnaissance companies normally operate in patrols of two to three vehicles each. They concentrate their reconnaissance along the army's main axes of advance. Their reports allow division ground reconnaissance assets to refocus their efforts. The size and vehicle composition of patrols depends on the terrain, known or suspected enemy strengths, and the importance of the axis.

The depth to which all of these assets operate, however, depends on several factors. Army ground reconnaissance assets focus on the commander's intelligence requirements, which vary based on the assigned mission. Generally, these requirements coincide with the operational reconnaissance priorities previously discussed. The depth to which they operate also depends on the location of the commander's initial and subsequent missions. These depths are influenced by the base organization of the overall force. Predominantly light infantry forces have much shallower missions than motorized or mechanized forces. Also, the depths to which they operate depends on the amount of time needed to conduct their reconnaissance, against their stated priorities, prior to arrival of maneuver forces. The basic organization of the overall force, and differing unit movement times, are factors here as well.

In **defensive** operations, ground reconnaissance assets operate along the forward edge of the security zone. The reconnaissance assault company tends to operate from single vehicles or small teams, establishing observation posts on dominant terrain. The reconnaissance companies still

operate in small patrols of two to three vehicles each along the enemy's expected avenues of approach. District and division ground reconnaissance may adjust their efforts, based on reports from these patrols. Platoon headquarters, however, tend to operate from relatively static sites along the expected enemy avenues of approach in order to maximize placement of ground surveillance radars. They would move to successive, previously reconnoitered positions.

Artillery Reconnaissance

Military regions and armies normally receive an artillery regiment or artillery brigade. The standard artillery regiment has a sound ranging and radar reconnaissance battery, equipped with several battlefield surveillance radars and a counter mortar/counterbattery radar. Depending on the brigade type, artillery brigades which could be allocated by the General Staff have a variety of meteorological, battlefield surveillance, and counter mortar/counterbattery radars.

Chemical Reconnaissance

Armies normally receive a chemical protection company, identical to those organic within divisions. Each company has a chemical reconnaissance platoon. It detects, reports on, and marks areas of contamination, both OPFOR- and enemy-created. It may establish chemical and radiological observation posts and patrols, or attach individual specialists to standard reconnaissance or security forces operating forward of the main forces, both in the offense and defense.

Engineer Reconnaissance

Military regions and armies normally receive an engineer battalion, identical to

those organic within mechanized infantry divisions and some districts. Each battalion has one engineer reconnaissance platoon. Like the chemical reconnaissance platoon, they may attach individual specialists to standard reconnaissance or security forces operating forward of the main forces, both in the offense and defense.

Tactical Reconnaissance

The OPFOR definition of **tactical reconnaissance** differs from that for operational reconnaissance only in scope. The measures taken are to acquire and analyze information about an actual or probable enemy's units and the area of combat operations, in order to prepare for and conduct combat operations. Tactical reconnaissance, however, supports military district, division, and lower echelons.

In addition to region and army priorities, tactical reconnaissance would try to define local, more specific threats. General tactical reconnaissance priorities include--

- The location of direct support artillery, and their associated radars.
- The disposition of tanks, and their infantry antitank systems.
- The location of division, brigade, and battalion command posts, as well as their logistical facilities and line of communication.

In the **defense**, priorities include identification of the enemy's main effort and the location of his second echelon or reserves. In the **offense**, priorities include the nature and extent of obstacles, both natural and man-made; and the location and degree of defensive position preparation.

Much of the district's or division's reconnaissance capability either comes from

the region's resources, or its application is roughly the same. The following paragraphs only address differences in organizations or asset employment.

Directorate of Military Intelligence

In **offensive** operations, teams from the operations battalion can be attached to first-echelon divisions for more timely exploitation of captured personnel and materiel. In **defensive** operations, the teams may be attached to both districts and divisions. Normally, they are not allocated lower than this. Their priorities in offensive and defensive operations are the same as for the region or army.

Reconnaissance and REC Battalions

Districts and divisions may have these battalions organic. Whether organic or allocated, their use is identical. Positioning and mission priorities for intercept, DF, and jamming assets are the same as previously discussed. The only difference is that assets focus on regiment/brigade forces and below, as well as their combat support assets.

In **offensive** operations, the battalion's ground reconnaissance assets could operate to a depth of 100 km. They concentrate on the division's main axes of attack. The reconnaissance assault company is identical in composition, capability, and employment to the company in the battalion at army. The reconnaissance companies normally operate in patrols of two to three vehicles each, concentrating their reconnaissance along the division's primary axes of advance. Their reports allow brigade-level ground reconnaissance assets to refocus their efforts, as required. The depth to which all

of these assets operate depends on the same factors discussed previously.

In **defensive** operations, ground reconnaissance assets operate throughout the depth of the security zone. The reconnaissance assault company and two reconnaissance companies adhere to the same employment principles as for the army.

Commando Battalion

Military districts may have one of these battalions organic. Although its primary mission is counterinsurgency within the territorial boundaries of the district, reconnaissance reporting is a standard requirement, based on a standing set of intelligence requirements. The battalion or some of its subunits can conduct special reconnaissance or direct-action missions. If employed in this role, they operate in squad-to platoon-sized teams within the security zone. Their availability for special missions depends on the degree of insurgency activity within the district.

Militia/Civilian

Militia forces or civilians would probably be located in villages or towns encompassed by the security zone or main defensive area. Normally, their reconnaissance role is not an active one. As a rule, reporting is not timely, and the reliability of the information varies widely. Standard reconnaissance forces, however, may request point observation coverage within or nearby the village or town, particularly in less threatened sectors or less likely enemy avenues of approach. This frees the standard

reconnaissance forces to focus on the most probable avenues.

Artillery Reconnaissance

Military districts and divisions normally have or receive an artillery regiment. The standard artillery regiment has a sound ranging and radar reconnaissance battery, equipped with several battlefield surveillance radars and a countermortar/counterbattery radar.

Chemical Reconnaissance

Divisions normally have a chemical protection company. Employment of its chemical reconnaissance platoon is the same as previously discussed.

Engineer Reconnaissance

Military districts and mechanized infantry divisions normally have or receive an engineer battalion. Each battalion has one engineer reconnaissance platoon, which is employed as previously discussed.

Reconnaissance Formations

At the operational and tactical levels, OPFOR commanders and their staffs use a variety of formations to conduct ground reconnaissance. They also use a variety of assets. Although most of these formations are commonly used by standard ground reconnaissance units, they are applicable to any infantry force which the commander or staff designates to conduct the mission. The basic reconnaissance formations are detachments, groups, and patrols.

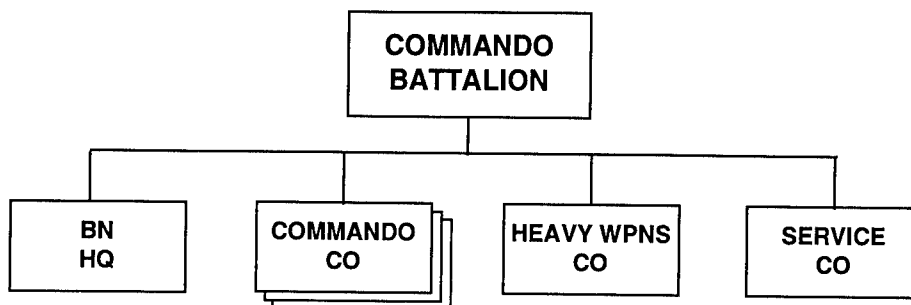


Figure 8-4. Commando battalion.

Reconnaissance Detachments

Reconnaissance detachments are the largest organized reconnaissance force. They are battalion-sized formations, and use a light, motorized, or mechanized infantry battalion as a base. The base battalion may be augmented by an tank platoon or company, an artillery or mortar battery, a combat engineer platoon, and NBC specialists. Reconnaissance detachments are formed by districts, divisions, or higher formations. The most common conditions for their formation are either a lack of standard reconnaissance assets at a given echelon, or the commander's desire to hold his trained reconnaissance forces in reserve and use regular infantry for the initial reconnaissance.

In the **offense**, the detachment deploys along the axes designated for the main attack. Each company operates by dispatching platoon-sized patrols (discussed later) to reconnoiter specific objectives along the routes. The detachment's primary mission is to gather information on the enemy's main defensive locations: unit positioning and force composition (particularly antitank assets), gaps in the defense, and unit boundaries. If gaps are discovered which the reconnaissance detachment can exploit, some subunits would set up a series of observation posts to keep the main defense under surveil-

lance, while other subunits continue into the depth of the defense, focusing their reconnaissance on locating the enemy reserve, artillery positions, command and control facilities, and logistics facilities. Except in highly compartmentalized terrain, platoons of each company attempt to move so as to be mutually supportive of each other. If the patrols discover a weak or unprotected enemy unit, they would attempt to defeat it. If the patrols discover enemy reconnaissance, they would muster the force to defeat it, either by reconsolidating into a company to achieve numerical superiority, or by calling for artillery. It should be noted that observation is the detachments primary method of gathering information. The above examples are exceptions. The detachment does not return to its parent organization prior to the OPFOR attack.

In the **defense**, the detachment may be sent forward of the security zone to determine the enemy's strength and main axes of attack. It may also be formed due to a lack of ground reconnaissance assets, and perform standard reconnaissance missions in the security zone. The detachment does not return to its parent organization prior to the enemy attack.

Reconnaissance Groups

Reconnaissance groups are company-sized formations, typically formed around a light, motorized, or mechanized infantry company. They may also use a commando company as a base. They are used in support of offensive operations. Groups may originate at region level, but are more commonly formed at district and division level. Their missions are conducted behind enemy lines. Primary targets include command and control posts, airfields, radioelectronic systems, troop concentrations, and troop movements (particularly enemy reserves). The group can infiltrate by foot or vehicle, or be inserted by helicopter. When infiltrating on foot or by vehicle, the group would move in patrol-or team-sized formations. The group conducts reconnaissance through observation, and by more active methods, such as ambush, raid, and direct attack. Apart from its size, the major difference between a detachment and a group is that the group's missions are conducted against deeper, more specific targets. Reconnaissance groups do not normally return to their parent unit prior to the OPFOR attack. They usually maintain observation of the critical targets which they were sent to reconnoiter and continue to report. If their mission included destruction of the target, they may return if able to exfiltrate by foot or vehicle.

Reconnaissance Patrol

The generic term reconnaissance patrol has two applications. First, it describes subsets of other reconnaissance organizations, such as those sent out from reconnaissance detachments or from companies of the reconnaissance and REC battalion. Second, it serves as a general heading encompassing several very specific types of patrol. They are--

- Independent reconnaissance patrols.
- Combat reconnaissance patrols.
- Engineer reconnaissance patrols.
- Chemical reconnaissance patrols.

All patrols are platoon-sized. This section will focus on the two specific types of reconnaissance patrol not previously discussed.

Combat Reconnaissance Patrol.

Combat reconnaissance patrols are platoon-sized formations, which use a light, motorized, mechanized infantry platoon, or tank platoon as a base. Augmentation may come from engineer or NBC vehicles, or individual specialists. These patrols are used within **march formations**, when the enemy situation forward or to the flank of a moving force is unclear. Normally formed at maneuver battalion or brigade level, they patrols have the dual missions of reconnaissance and security. Standard reconnaissance platoons, if organic to the organization, may be used for this mission. Most commanders, however, choose to use infantry for this mission, keeping their reconnaissance in reserve. Depending on the situation, more than one patrol may be dispatched. The commander, in forming multiple patrols, must weigh his desire for information against the drain on his combat power. Given the route security portion of its mission, the patrol is more limited in the depth of its actions than other reconnaissance patrols. It may engage a weaker force by ambush, but observation is the preferred method of reconnaissance. Given the reason for its formation, the patrol can only be successful if it survives to provide the commander detailed information on the enemy main body and the route on which it moves. The mission is a temporary one. The platoon may return to its parent organization

prior to the attack or any other subsequent mission.

Independent Reconnaissance Patrol. Independent reconnaissance patrols are platoon-sized formations, which use light, motorized, or mechanized infantry platoons as a base. If ambushes or raids are an integral part of the patrol's mission, commandos may be used. The patrol may be augmented by engineer or chemical reconnaissance vehicles, or by individual specialists. These patrols are formed at brigade or district and division level. They are primarily an **offensive formation**, normally employed when the OPFOR commander has a very specific intelligence requirement regarding the enemy or the terrain. This patrol may be formed in addition to standard reconnaissance, or due to the failure of standard reconnaissance to fulfill the commander's intelligence requirements. It moves along a specific axis to achieve a single objective. It operates to much greater depths than other platoon-sized patrols, often equal to the depths of district or divisional reconnaissance. Observation is the preferred method of reconnaissance, but ambushes and raids may be integral to the success of its mission. The mission is a temporary one, but the depth of the mission may preclude the patrol's return to its parent organization prior to the offensive.

Reconnaissance Methods

All reconnaissance formations use standard methods in the conduct of their missions. These are: **observation**, **sweep**, **ambush**, and **raid**.

Observation

Observation is the coordinated inspection of the enemy, terrain, weather, wa-

ter obstacles and adjacent friendly forces during all types of combat activity. It is the most common and most important method of gathering reconnaissance information. Observation takes place from dismounted patrols, vehicles, and aircraft. It is the primary technique used by ground reconnaissance formations.

Sweep

A **sweep** is a surprise attack against enemy observation posts or other isolated positions near the forward edge. It normally occurs when the OPFOR is in contact with the enemy. The force conducting the sweep can be as small as a few dismounted soldiers or as large as a platoon. The primary objective is to capture enemy soldiers and documents to be exploited for intelligence purposes. In a typical sweep, a large team (platoon-sized) is divided into an assault section, a fire section, and an engineer section. The engineers clear a path through obstacles for the assault section. The assault section attacks the enemy outpost, captures prisoners and documents, and attempts to retreat to friendly positions. The fire section covers the withdrawal.

Ambush

An **ambush** is a planned or spontaneous attack along probable routes of movement, such as roads, paths, bridges, or lanes through obstacles. Enemy ground reconnaissance, ground surveillance radars, engineer, and command and control vehicles are the most common targets. An ambush may be conducted by any of the reconnaissance formations or their subunits. The typical ambush team is a reinforced platoon divided into an observation section, an assault section, and a fire section. The observation section alerts the rest of the ambush

team to the enemy's approach. When the enemy reaches the designated kill zone, the fire section swiftly engages the enemy, and the assault section then attempts to seize prisoners. Following the assault, the team searches the vehicles and dead soldiers for documents. The team then hides the vehicles and the bodies before returning to its parent unit with prisoners and captured documents.

Raid

A **raid** is a surprise attack against key targets such as command posts, airfields, logistics facilities, enemy reserves, or enemy air defense and artillery radar sites. This is a planned mission; it is not conducted spontaneously in the course of another reconnaissance mission. With the exception of radar sites, the size of the targets dictates that reconnaissance groups or detachments conduct this mission. The size of the group or detachment allows for the dispatch of multiple patrols, increasing the likelihood of finding the target will be found. Breaking into smaller patrols also decreases the possibility of detection. Once the target has been located, the formation would regroup and attack it simultaneously. A raiding party gathers what prisoners and documents it can, but intelligence collection is a secondary responsibility.

RADIOELECTRONIC COMBAT (REC)

REC is an integral part of the OPFOR doctrine. It consists of the use of all means of manipulation of radioelectronic emissions throughout the electromagnetic spectrum. This includes electronic jamming of radios and radars, as well as the physical attack of communications centers and transmitters by ground troops, artillery and

aircraft. It is combined with imitative and deceptive communications methods to support deception.

The OPFOR has been upgrading its electronic warfare (EW) systems and technology to supplement its aging equipment. The older systems focused on small-scale tactical uses, while the operational use was limited to targets of opportunity in conjunction with local offensive or defensive operations. Newer EW systems are centralized in the **Directorate of Military Intelligence**, with the exception of naval, aircraft, and air defense unit countermeasures. The older systems have been retained in the district and division reconnaissance organizations. Upon receiving the REC assets, some units may integrate them with their own ECM plan, using them to aid deception. Destruction by fires is the preferred jamming technique. Passive electronic counter-countermeasures (ECCM) measures, such as use of messengers, manual encryption or rarely, secure communications devices are employed.

Electronic Support Measures

Identification, location, and the nature and use of enemy electronic emissions is key to countering and exploiting them. **Electronic support measures (ESM)** are all means used in this collection and analysis. In the OPFOR, ESM is the mission of the units within the Directorate of Military Intelligence and the radio and radar reconnaissance company of the reconnaissance and REC battalion. It deploys radio intercept, and radio and radar direction-finding receivers as part of its collection effort. Technical analysis is then performed for REC purposes. In accordance with the REC plan, emitters are targeted for deception, jamming, or destruction.

Units in whose sector radio and radar reconnaissance teams are operating may be augmented by an EW liaison representative at the brigade main command post who passes targeting information to the artillery fire control system through the maneuver brigade intelligence officer. Targets of air interest are passed directly by the Directorate of Military Intelligence to the Air Force.

Electronic Countermeasures

OPFOR **electronic countermeasures (ECM)** are employed to neutralize enemy communications and electronics through jamming and deception. REC doctrine establishes a requirement to destroy enemy command and control and weapons system communications. When these systems cannot be destroyed they should be jammed at critical times.

Reconnaissance and REC battalions in the Directorate of Military Intelligence have a ground-based jamming company. The Air Force has several communications jamming aircraft. The aging electronics have in some cases been replaced with either commercial "off-the-shelf" systems, or military systems available on the open market. Aircraft and air defense units have self-screening jammers that attempt to disrupt weapon guidance systems, or aircraft navigation systems. Aircraft also include some deceptive transmitters, mainly to project false locations to enemy air defense systems.

Physical Destruction

Integral to OPFOR REC doctrine is the use of **physical destruction** means. The primary means of defeating enemy communications and radars is through fire. Even a small raid or harassing fire on a headquarters can interrupt the enemy planning cycle.

Critical command and control nodes, air defense radars, and satellite terminals are priority targets. The OPFOR can physically attack in three ways:

- **Indirect fire.** This includes artillery, mortars, rockets, and surface-to-surface missiles (SSMs).
- **Ground attack.** The OPFOR may attempt to destroy command, control, and communications elements by using special operations forces, airborne and heliborne forces, or other elements operating behind the frontlines.
- **Air attack.** The OPFOR may attack with high performance aircraft or helicopters. Ground forces may be used to plant a transmitter within the enemy perimeter for beacon bombing.

Deception

While deception is a multi-disciplined part of the operation, no aspect more lends itself to use of deception than interference with enemy communications. Methods employed include--

- Imitative and deceptive radio transmission.
- Deception radar and radio emitters used to portray false units.

Several components are employed simultaneously for maximum effectiveness. Disinformation is an especially effective way of disrupting an opponent's command and control. Deception through disinformation seeks to not only alter the perceptions of the enemy, but also one's own units and clients. Planning for employment of deception is required by regulation.

Dedicated tactical non-communications means of deception are poorly de-

veloped. Extensive use of dummy positions is practiced, using field-expedient materials. Troop movements must be simulated by such means as use of civilian vehicles to portray movement to radar, and marching refugees to portray movement of troops in the rear. Simple radar corner reflectors are used to provide masking.

ENGINEER SUPPORT

OPFOR engineers fall into two basic categories: **combat engineers (sappers)** and **technical engineers**. Combat engineers are those whose tasks may require direct contact with the enemy. Technical engineers do not normally engage the enemy; they generally use utility vehicles as their primary transportation. Together, these two groups are responsible for the more difficult and complex engineering tasks. Their missions require specialized training and the use of special equipment or munitions. Since many basic combat engineering tasks can be performed by infantry or civilian workers, engineers are also responsible for providing guidance and technical expertise to these groups.

Resources and Allocation

National

The following unit types exist within the pool of resources controlled by the General Staff.

Combat engineer brigade. The brigade is composed of one each of the following battalion types: combat engineer (sapper), road/bridge, obstacle, obstacle clearing, and pontoon bridge (See Figure 8-5). Combat engineer units at the national level are never held in reserve at that level.

They are normally allocated by battalion. How the battalions are allocated depends on the needs of forces conducting offensive operations and the level of defensive preparedness within military regions. For example, the combat engineer battalion and obstacle battalion may be allocated to threatened regions, with the balance going to the expeditionary army.

Pontoon bridge regiment. The regiment has two or three pontoon bridge battalions, each with three pontoon bridge companies (See Figure 8-6.) Either as a regiment or by individual battalion, it would be allocated to the expeditionary army.

Engineer battalion. This battalion is composed of one each of the following company types: combat engineer (sapper), assault crossing, technical, road/bridge construction, and pontoon bridge. The battalion also includes an engineer reconnaissance platoon, as well as other support platoons (See Figure 8-7.) These separate battalions are identical to those organic to the combat engineer brigade. Allocation depends on how many battalions already exist in the region or army. Some districts have these battalions in peacetime; all standing mechanized infantry divisions do. The priority would go to the expeditionary army, followed by defending regions.

Assault crossing battalion. This battalion has three tracked amphibian companies and one tracked ferry company (See Figure 8-8.) It would be allocated to the expeditionary army.

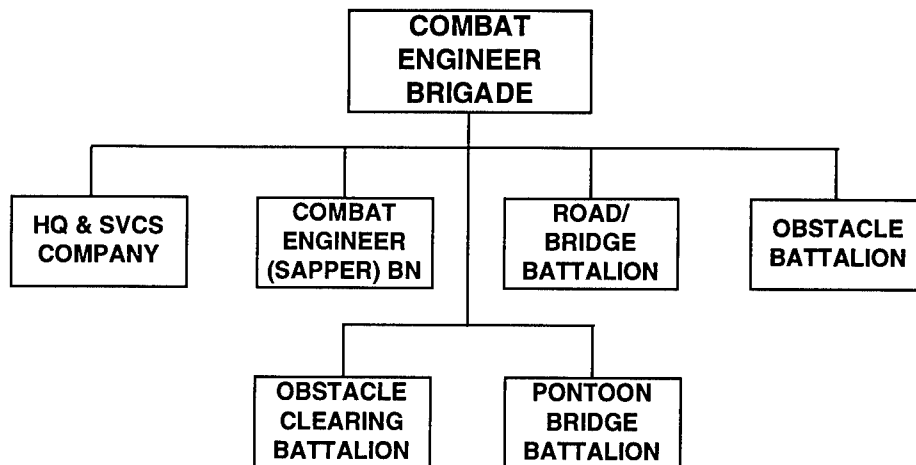


Figure 8-5. Combat engineer brigade.

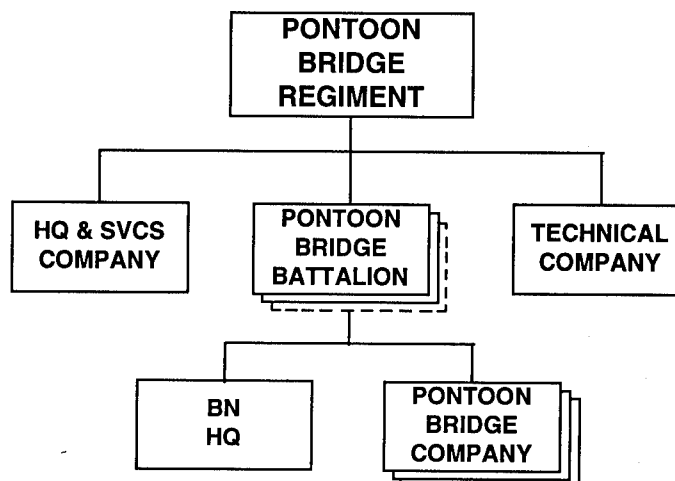


Figure 8-6. Pontoon bridge regiment.

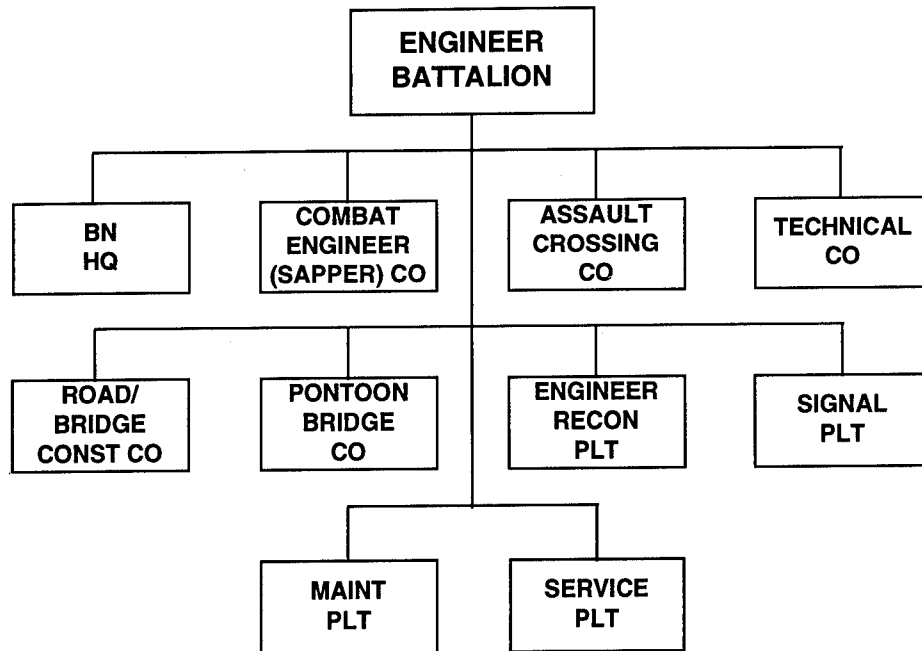


Figure 8-7. Engineer battalion.

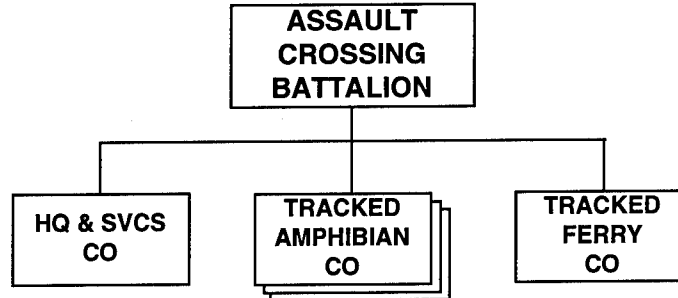


Figure 8-8. Assault crossing battalion.

Military Region and Army

Any engineer organizations at this echelon would come from General Staff allocations. Specialty battalions from the combat engineer brigade and the pontoon bridge regiment, or the assault crossing battalion, would be retained at region level initially. Combat engineer battalions would be further allocated to subordinate districts or divisions.

During peacetime, region and district engineer work focuses on road and line of communication maintenance. These missions continue in wartime. Therefore, most of the assets regions receive are geared toward these missions. An expeditionary army, due to its mission, receives the premium mobility assets.

Military District and Division

Engineer organizations at this echelon could either be organic, or allocated from the region or army. Some districts, and all standing mechanized infantry divisions, have organic combat engineer battalions. Motorized and light infantry divisions have an organic engineer company, composed of the following platoons: mine warfare, bridge, and technical (construction). This company is identical to the company organic to all maneuver brigade types, separate or divisional. How much additional support is allocated depends on the mission, and the amount of peacetime preparation already conducted. Many districts, due to primarily defensive contingency missions, have done preliminary work on defensive positions.

Support to Offensive Operations

The general aims of engineer support to offensive operations are--

- Preparing for concealed movement and deployment for the attack.
- Enhancing the protection of troops and equipment.
- Repelling likely enemy attacks.
- Maintaining offensive momentum, in spite of natural and man-made obstacles.

Preparation

To prepare for offensive operations, engineer support tasks include--

- Performing engineer reconnaissance of the terrain and the enemy.
- Preparing assembly areas for first- and second-echelon forces, reserves, and command posts.

- Constructing protective positions for SSM units, air defense units, and command posts.
- Establishing and improving road networks to support maneuver forces.
- Preparing alternate airfields and highway strips to support Air Force assets.

Conduct

During the conduct of offensive operations, engineer support includes--

- Continuing reconnaissance of the enemy and terrain.
- Improving road networks to support commitment of the expeditionary army second echelon or reserves.
- Providing support for the crossing of water obstacles.
- Constructing protective positions for SSM missile units, air defense units, and command posts, as they relocate.
- Help to repel enemy counterattacks.
- Maintaining airfields.
- Supplying engineer equipment, materials, and technical assistance to maneuver units and combat formations.

Support to Defensive Operations

The general aims of engineer support to defensive operations include--

- Establishing conditions necessary for organizing the defense.
- Protecting personnel and equipment from the effects of conventional fire and weapons of mass destruction.
- Creating or improving existing obstacles.

Preparation

To prepare for defensive operations, engineer support tasks include--

- Advising commanders on the protective and camouflaging features of terrain.
- Establishing obstacles to the front and flanks of first-echelon units, and, as time permits, throughout the defensive depth.
- Preparing defensive positions for, or providing technical guidance to maneuver units preparing positions for, first-echelon defending units.
- Constructing protective positions for SSM missile units, air defense units, and command posts.
- Building or improving routes for counterattacking forces.
- Repairing or improving airfields.

Conduct

During defensive operations, support consists of continuing and improving upon the above tasks.

Engineer Tasks

OPFOR writings detail seven basic technical tasks that engineer troops perform in support of combined arms operations:

- Reconnoiter the enemy and the terrain.
- Prepare fortifications.
- Prepare and maintain routes of movement.
- Clear passages through obstacles.
- Equip and maintain gap crossings.
- Establish engineer obstacles.
- Carry out engineer camouflage measures.

These tasks constitute the basic activities performed by engineers in support of both offensive and defensive operations. Most of which involve specific engineer skills. The three tasks which are primarily combat engineer tasks are reconnaissance, obstacle clearing, and establishing engineer obstacles. The following paragraphs give a brief overview of each task.

Engineer Reconnaissance

Engineer reconnaissance elements collect information on the enemy's engineer posture and the condition of the terrain. Means of collecting information include observation, ground and aerial photography, and exploitation of documents, prisoners, and local residents. Engineers are included in all reconnaissance elements of maneuver units. Dismounted recon patrols will include engineers whenever a bridge or obstacle is the object of the reconnaissance mission. On the **march**, the primary goal is to provide detailed information on the passability of march routes. In the **offense**, reconnaissance attempts to obtain information on the nature of enemy fortifications and defensive positions, as well as the composition and types of equipment and obstacles of the enemy. In the **defense**, reconnaissance elements observe enemy preparations for the attack and determine the character and extent of enemy engineer activity.

Fortifications

Preparing fortified positions is a task conducted by engineers during all missions. The real effort, however, is on defensive operations. On the **march**, the amount of engineer preparation depends on the amount of time to be spent at the location. In the **offense**, the priority is to assembly areas. In the **defense**, preparation involves en-

trenchments, positions for combat vehicles, and protection for command posts. Normally, the effort required exceeds the capabilities of organic engineers. Even with engineer augmentation, much of the work must be done by infantry soldiers receiving technical advice and assistance from engineer specialists.

Movement Support

The movement support function includes all engineer activities which facilitate the movement of maneuver forces. For all missions; this usually involves forming special groupings from engineer assets. There is no set size for these groupings. Composition depends on the mission, terrain, time, equipment available, and the enemy. However, they normally contain route and mine clearance vehicles and equipment. They should be able to perform the following functions: fill craters, clear mines, prepare bypasses around major obstructions, and identify contaminated areas. On the **march** and in the **offense**, these groups would travel in advance of the main forces. In the **defense**, these groups precede counterattacking forces. In all instances, their mission is to prepare and maintain the number of routes needed by the parent organization.

Obstacle Clearing

Although the OPFOR anticipates performing this function in all missions, the task is most characteristic in the **offensive**. Creating passages for attacking forces is a primary engineer task. Maneuver units, however, share the responsibility. The methods for creating breaches depend on the situation, type of obstacle, and the engineer assets available. Minefields are the most common obstacle. Minefield breaching during the offensive is the responsibility of

the maneuver unit. Mechanized forces use mine rollers and plows on tanks or a mine-clearer. Assault breaching for dismounted attacks is normally accomplished by infantry aided by sappers, usually under the cover of smoke or darkness.

Gap Crossing

Gap crossing often involves using bridges, ferries, or amphibious combat equipment. It is normally associated with the **offensive**. Engineers advise maneuver commanders on the choice of crossing sites, prepare or improve routes to the selected sites, and establish the sites themselves. They are also responsible for concealment of the real sites and the creation of dummy sites.

Obstacles

Creating engineer obstacles and carrying out demolition activities are significant engineer functions in all operations. Engineer obstacles include any actions taken to inflict losses and to delay and impede enemy movement. In the **offense**, obstacles protect flanks, disrupt counterattacks, and strengthen captured positions. In the **defense**, obstacles strengthen the defense, disrupt enemy operations, and cover gaps. Most OPFOR discussion of obstacles focuses on the use of mines. Minefields are emplaced by sappers with troop labor, or in better-equipped engineer units, by mechanical minelayers. Antitank minefields are used along high-speed avenues of approach to deny passage of mobile formations. Antipersonnel mines are used in conjunction with antitank mines to delay their clearance. Antipersonnel minefields are used in difficult terrain to prevent light infantry from bypassing OPFOR positions. Artillery-delivered mines are fired on existing obsta-

cles to fill enemy breaches, or behind the lead echelon of the enemy to isolate part of his forces. Light infantry and special operations forces commonly use command-detonated mines to initiate ambushes.

Camouflage and Deception

This is primarily the responsibility of maneuver units. Engineer support normally involves advice and assistance. On the **march**, actions include selection of routes that minimize tracks and dust; movement at night, fog, or periods of reduced visibility, including generated smoke or obscurants; and convoy and light discipline. In the **offense**, actions include selection of terrain for its screening effect; use of concealed routes, and use of natural and man-made camouflage screens. In the **defense**, actions include all measures to mislead the enemy about the size and location of forces and weapon systems and about the nature of defensive engineer preparations.

NBC OPERATIONS

Nuclear

Although intelligence sources have reported that the OPFOR is conducting nuclear research, these efforts are in the most rudimentary stages. The OPFOR lacks the technological sophistication to develop and construct the facilities required for nuclear weapon production. For it to achieve this capability, the great majority of the effort would need to come from outside its territorial region. Therefore, the likelihood of the OPFOR developing a nuclear battlefield capability is remote. As with all counties, however, there is a possibility that the OPFOR could acquire one or two small, crude nuclear devices.

Potential **delivery means** are discussed nowhere in OPFOR doctrine or open-source military writings. If the OPFOR obtained a crude device, it would probably be delivered by an airframe.

Biological

There is no evidence that OPFOR research and development activities exceed those expected for biological warfare protection purposes. Biological weapon employment has, however, been discussed at length within open-source military publications. Some biological agents are extremely persistent, retaining their capabilities to infect for days, weeks, or longer. If the OPFOR decides to acquire or develop biological weapons, and subsequently to employ them, it would probably be targeted against the enemy's rear area. These targets could include food supplies, water sources, troop concentrations, convoys, and urban and rural population centers rather than frontline forces. The OPFOR realizes that, if biological agents are employed against such targets, they could seriously disrupt and degrade mobilization plans as well as the subsequent level of combat. The prolonged incubation period makes it difficult to track down the initial location and circumstances of contamination. There is a degree of danger inherent in the use of some pathogenic microbes because of the difficulty or near impossibility involved in controlling an epidemic caused by them. Some pathogenic microbes and toxins derived from microbes are not contagious, while other microbes cannot be transmitted without a suitable vector.

Potential **delivery means** mentioned within writings include rockets, artillery shells, aircraft sprayers, saboteurs, and infected rodents.

Chemical

To date, the OPFOR has only employed irritants, such as CS, for riot control. Its chemical industry, however, is fully capable of domestically manufacturing common nerve agents, such as the GB series, and blister agents, such as mustard and phosgene. The nerve agents are fast-acting, and practically odorless and colorless. At low concentrations, the GB series incapacitates; it kills if inhaled or absorbed through the skin. The rate of action is very rapid if inhaled, but slower if absorbed through the skin. The blister agents blister the skin and respiratory tract and can cause temporary blindness. They are especially lethal if inhaled.

Employment

OPFOR national policy statements have condemned the use of chemicals by other countries. Its doctrine does not address how it would employ chemical munitions. However, open-source military journals have addressed usage in theoretical terms. Potential offensive and defensive usage is based on this. In **offensive** operations, likely OPFOR chemical targets could include--

- Enemy high-precision weapons delivery systems and storage sites.
- Airfields.
- Key points along rear area lines of communications.
- Troops occupying defensive positions within the OPFOR main attack.
- Troop concentrations, headquarters, and artillery positions.
- Bypassed pockets of resistance that pose a threat to the flanks or rear of attacking forces.

In **defensive** operations, persistent agents would be employed to deny the enemy use of certain terrain and to canalize enemy forces.

Unfilled munitions are in storage. These include aircraft bombs, multiple rocket launcher munitions, as well as FROG and SCUD warheads.

Chemical Protection

Resources

The OPFOR has a small corps of chemical protection troops found at the national level, military region, district or division, and brigade. Most artillery, air defense, airborne, and special operations units at regiment/brigade and above have organic chemical protection elements, as well. Chemical protection battalions at the national level have two decontamination companies, and one chemical reconnaissance company. (See Figure 8-9.) Regions and armies, neither of which have an organic chemical defense capability during peacetime, may receive one of these battalions. Military districts may receive one. Standing divisions have an organic chemical protection company, composed of two decontamination platoons and one chemical reconnaissance platoon. Most separate and divisional brigades have a chemical protection platoon, composed of three chemical reconnaissance squads, three vehicle decontamination squads, and one personnel decontamination squad. Light infantry brigades, currently not equipped with a chemical protection capability, would probably receive assets during wartime.

Missions

Chemical protection troops have two primary missions: **NBC reconnaissance** and **NBC decontamination**. Although the OPFOR is limited in the amount of NBC equipment available, its basic missions include--

- Reconnoitering known or likely areas of NBC contamination.
- Warning troops of the presence of NBC contamination.
- Monitoring changes in the degree of contamination of troops positions.
- Performing or monitoring the NBC decontamination of personnel, weapons, clothing, equipment, vehicles, troop positions, and sections of roads.

NBC reconnaissance. NBC reconnaissance is performed by chemical protection personnel assigned to reconnaissance elements of chemical protection units. NBC reconnaissance involves two general types of activity: **patrolling** and **establishing observation posts**. When operating in chemical reconnaissance patrols, personnel travel in reconnaissance vehicles especially equipped with NBC detection and warning

devices. The reconnaissance assets of chemical protection units, such as the chemical reconnaissance platoon of a chemical protection company, can reconnoiter a large contaminated area or be divided into squads and attached to combat units to perform reconnaissance of multiple routes. Although normally staffed with chemical protection specialists, NBC observation posts can be manned by combat troops who have received special training. The functions of NBC observation posts are to detect NBC contamination, to determine radiation levels and types of toxic substances, to monitor the drift of radioactive clouds, to notify higher headquarters of NBC information, as well as meteorological data, and to give the general alarm to threatened troops. An NBC observation post normally consists of three or four observers located near the command post of a combat unit. During movement, the NBC observation post moves in its own vehicle in close proximity to the combat unit commander.

NBC decontamination. At all levels, chemical defense reserves are formed, especially on main axes. They carry out decontamination of attacked units or those

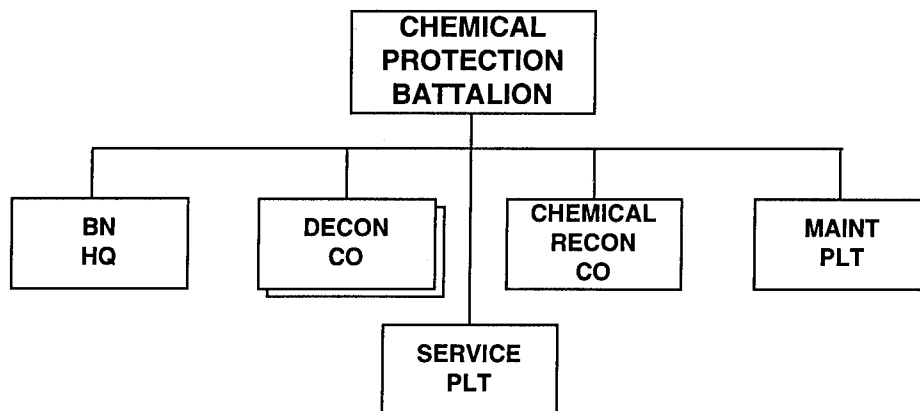


Figure 8-9. Chemical protection battalion.

unable to bypass decontaminated areas. This is done as early as possible to maintain the combat effectiveness of units. Decontamination of routes is also possible, but only if alternate routes are not available.

SMOKE

The OPFOR plans to use smoke and obscurants in its operations. Most applications would be during offensive operations. The OPFOR has sufficient smoke assets to support combat operations, however, its stockpiles of obscurants are normally low. As a result, smoke is normally not used for training purposes. It is anticipated that the OPFOR would acquire additional obscurant capabilities prior to hostilities.

Resources

The only dedicated smoke units within the OPFOR inventory are smoke battalions held at the national level. Each battalion has three smoke companies; each is equipped with nine smoke generators. These would be allocated, either as battalions or individual companies, to regions or armies. The first priority would be to an expeditionary army conducting offensive operations, then to defending regions where the enemy's main attack is expected. Most

smoke operations, however, will be conducted using the following capabilities:

- **Artillery.** Artillery and mortars are used for delivering obscurant-filled munitions.
- **Aircraft.** Aircraft-mounted smoke generating equipment is in the inventory for both fixed- and rotary-wing platforms.
- **Smoke pots.** Smoke pots are the primary source of smoke to support operations. Organic engineers can set out smoke pots when smoke units are not allocated.
- **Specialist vehicles.** Although not designed for this purpose, some decontamination vehicles within chemical protection units are used for smoke dissemination.
- **Armored fighting vehicles.** Most OPFOR tanks and infantry fighting vehicles can generate smoke through their exhaust systems.

Types of Smoke

The OPFOR identifies four ways in which smoke can be used: **camouflage smoke**, **blinding smoke**, **decoy smoke**, and **reconnaissance smoke**. Each type is classified as being frontal, oblique, or flank, depending on the placement of the screen.

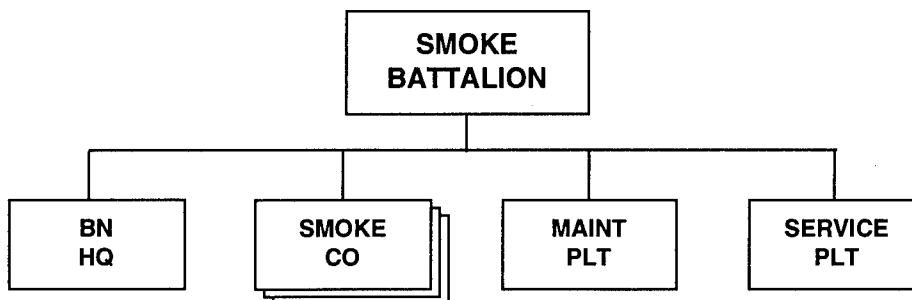


Figure 8-10. Smoke battalion.

Camouflage Smoke

Camouflage smoke is used to cover OPFOR maneuver. It conceals the location of units and the nature and direction of their attack. It is useful on or in front of advancing troops, and is normally effective up until the point they deploy into battle formation. Camouflage smoke is usually generated by smoke pots, smoke generators, specialist vehicles, or armored fighting vehicles.

Blinding Smoke

This is smoke laid directly in front of enemy positions, especially those of antitank systems, target acquisition systems, and observation posts. Other likely targets are

counterattacking forces, rear assembly areas, and fire support locations. They can negate the enemy's ability to engage the OPFOR effectively. Blinding smoke rounds are normally part of the artillery preparation and fires in support of the attack.

Decoy Smoke

This type of smoke is generated to draw the enemy's attention away from the point of main effort.

Reconnaissance Smoke

Blinding or camouflage smoke can be employed prior to an attack, causing the enemy to fire into it. This pinpoints the firing systems, and allows the OPFOR to refine its fire plan for the true attack.

Chapter 9

Logistics and Rear Area Security

During the past twenty years, the OPFOR has made major improvements in all aspects of its logistics system and placed increased emphasis on rear area security. The government planned for the complete integration of civilian and military logistical structures at every level and stockpiled war materiel throughout the State.

In peacetime there remains a shortage of doctors, engineers, computer programmers, electronics technicians, and other support professions to maintain an elaborate support infrastructure. Once the reserves have been mobilized, however, these critical civilian professionals are pulled into military structure, especially into maneuver units forming the attack.

BACKGROUND

The OPFOR concept of the "logistics support area" visualizes war stretching from the forward edge back to the capital. To the OPFOR, there are two aspects in the logistics support concept: national and operational-tactical. The **national** aspect includes the entire country, its population, economy, government, and its political structure. It is the production base for necessary war materiel, the mobilization base for personnel replacements, and the control center for the complete war effort. The **operational-tactical** aspect includes the activities of all military units that provide maintenance, materiel, and medical support to combat forces. The logistical doctrine of the OPFOR represents a blend of principles growing out of both past experience and doctrine adapted from foreign sources.

Considerable emphasis has been placed on improving the efficiency of the OPFOR logistics system. It has increased the depth of forward service areas and increased the mobility and range of logistics units in support of frontline forces. Transportation assets have improved and capabilities for air delivery to forward areas have increased over the past few years.

OPFOR logistics support is divided into three principal functions: **materiel**, **maintenance**, and **medical support**.

- Materiel support includes the storage, transportation, and supply of ammunition, POL, spare parts, food, clothing, water, and other consumable items. Basically, this category covers all materiel required to fight the immediate battle.
- Maintenance is the maintaining and repair of equipment and weapons as well as other specialized measures associated with preparing equipment and weapon systems for employment. The supply of major end items (e.g. tanks, artillery, etc.) is also a responsibility of the maintenance system.
- Medical support includes the combat medical measures required for the evacuation and treatment of combat and non-combat casualties and for the prevention of disease.

OPFOR LOGISTICS PRINCIPLES

Centralized Planning

Centralized planning requires concurrent tactical and logistical planning as well as coordination with civilian industry and transportation. It ensures coordination of civilian war production and manning with military requirements. Since the State does not possess sufficient resources to support a large standing logistical and transportation system, centralized control is essential. In a national emergency, the OPFOR would mobilize a considerable number of logistics personnel and vehicles from the civilian economy. The OPFOR mobilization system has worked smoothly in exercises even though critical skills are clearly in short supply. Civilian professionals, personnel with critical skills, and transportation assets would also be nationalized during mobilization.

Centralized planning allows for tailoring of requirements to facilitate the prioritization of support. The civilian transportation system (ground, rail, water, and air) is fully integrated into the OPFOR wartime logistics system. Major portions of the civilian transportation system can be mobilized in wartime or national emergency along with medical facilities and engineer materiel and equipment. Centralized control also allows the use of motor transport assets from second-echelon units in frontline operations.

Forward Distribution

The OPFOR operates under the **forward distribution** principle, in which higher headquarters directly supply and service the next lower-echelon. Supplies and services are delivered directly to subor-

dinate units using the organic transportation assets of the higher headquarters. Thus, a military region would be required to transport material to military districts using the transportation assets of the military region. The military region controls all the depots throughout its subordinate military districts.

In the defense, the military region routinely distributes directly to separate brigades in the military districts. In this manner, the tactical logistics system (division and below) is linked to the operational system. Since the burden of supplying and maintaining engaged brigades falls upon higher headquarters, OPFOR planners have put the bulk of their logistics resources at the operational level (military region). The advantages of the system are obvious- the separate brigades remain mobile and are free to operate without being encumbered by slow-moving supply shuttles of organic vehicles, while the logistics backup is maintained at military region level and higher. This system also allows scarce resources to be focused to support priority requirements.

One level of supply may also be bypassed during emergencies. For example, a brigade may deliver directly to subordinate company. This concept does not prevent a subordinate unit from using its assets to obtain supplies from its higher headquarters, especially in critical situations.

Logistics Bases

Logistics bases are established at military region and above to provide support to the military districts and divisions. These bases are composed of all functions required to support sustained battle operations. This includes field hospitals, maintenance, and repair.

Tailoring of Logistics to Combat Operations

In spite of a high degree of centralization of logistics support, commanders have enough flexibility to adjust the amount and type of logistics support as combat conditions demand. Tailoring is accomplished by structuring logistics support units to meet forecasted requirements.

Individual Replacements

Losses are replaced with individual fillers. When units become attrited below 50 percent, the unit commander may consolidate his units to maintain effectiveness.

Prioritization

In the offense, supply priority generally goes to units conducting the main attack. Moreover, the relative priorities for ammunition, POL, repair parts, and other items may change with the combat situation. For example, a unit advancing rapidly with no opposition has a greater need for POL than for ammunition. In the defense, supply priority generally goes to units defending in the major enemy avenue of approach.

Standardization

The OPFOR has attempted to standardize its equipment when creating organizations and purchasing equipment. For example, tanks, and AFVs, in a brigade should be of a single type. Standardization eases maintenance and training, and increases the interchangeability of parts.

Use of All Possible Resources

In the defense, the OPFOR would be supported by the local populace. In the of-

fense, it would forage for food and use captured stocks of POL, engineer materials, and ammunition (if compatible).

Stockpiling

War materials are stockpiled for major commands and units in supply bases throughout the country. Large stocks of POL and ammunition may be positioned well forward to maintain quick and decisive action. A network of supply points and caches are established concurrent with mobilization.

Rotation of Equipment

The OPFOR does not necessarily repair an item of equipment and then return it to the unit of origin. Instead, items are returned to an equipment pool for allocation as priorities dictate.

Accountability

Supply discipline is strict and effective. Accountability for equipment and supplies is rigidly enforced to keep waste and loss at a minimum. The penalties for unnecessary waste are severe.

Use of Trailers

A strength of the OPFOR logistics system is the large number and extensive use of trailers. Loaded trailers are pulled forward to fighting units and exchanged for empty trailers. The empty trailers are returned to rear logistics bases for reloading. In this manner, fighting units maintain maximum quantities of critical supplies such as ammunition and fuel without incurring a large cost of manpower at the fighting level.

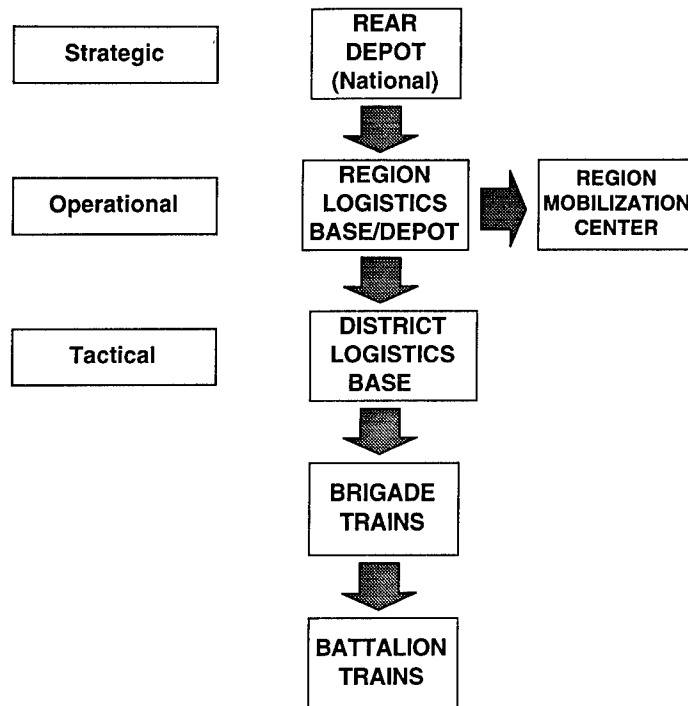


Figure 9-1. Forward distribution - military region.

LOGISTICS STOCKPILE

The distribution forward concept depends upon the movement of supplies from rear to front. The OPFOR realizes that LOCs can be vulnerable. To overcome this vulnerability, the stockpiling of supplies throughout the area of operations is emphasized. War stocks are held at the national-level rear supply depots, military region and district depots, major troop unit garrisons, and mobilization bases. The logistics storage of war materiel consists of two categories: **national** and **operational**.

National reserves include foodstuffs, petroleum products, manufactured goods, and other strategic raw materials. Stored in special government warehouses, these items can be issued only with the permission of the National Command Authority. While these stocks are considered to be separate from the military items

held in national reserve, military use of at least part of these items is anticipated. These stocks are not planned for use early in a conflict. The national reserves also comprises field hospitals and maintenance bases.

Operational reserves include materials held for issue to mobilized military units and for resupply to combat units in the early stages of a conflict. The military region commander determines the level and configuration of these stocks. The military regions also coordinate mobilization measures between military and civilian sectors. Basic loads of ammunition, fuel, rations, and repair parts are located with deployed ground units and transported by the unit's organic transport. Ground forces maintain these supplies for use in the immediate conduct of operations. They would be dispersed over a wide area. An extensive network of supply points and caches is established concurrent with mobilization.

LEVELS OF LOGISTICS SUPPORT

The logistics system is designed to provide continuous support from the strategic level down to the fighting unit. OPFOR military doctrine requires the armed forces and entire population be constantly prepared for the sudden outbreak of war. In wartime, logistics support provides maintenance, materiel, and medical support to forces engaged in combat. The OPFOR expects logistics requirements to be quite large in the initial stage of combat. In the following sections, materiel support is covered within the discussion of logistics bases at each echelon. Maintenance and medical support are covered separately.

Strategic Logistics Support

Strategic logistics support is coordinated at the national level within the Ministry of Defense. The responsibilities are the same during war and peace. Strategic organization logistical responsibilities include-

- Procuring of personnel, materiel, and services needed by the military.
- Preparing the economy and the people to provide sustained support in case of war.
- Ensuring the uninterrupted flow of personnel, materiel, and equipment reaches the frontlines at the proper time and place.

Organizations within the national-level logistics establishment include a loose grouping of materiel support and maintenance brigades and battalions, as well as mobilized civilian resources, to include medical personnel and facilities. Some of these battalions and brigades would be allocated to subordinate regions and districts to

reinforce the units forming their logistics bases, while the rest remain centralized under General Staff control.

Command and Control

Within the General Staff, the **Chief of the Rear** accomplishes central coordination of all support activities. His headquarters is the highest logistics organization of the armed forces and serves both to link the national economy and the armed forces, and to support operational commands directly.

The Chief of the Rear and his staff coordinate support operations from national to tactical levels. He is responsible for all logistical, transportation, materiel, and maintenance functions for the OPFOR. This staff ensures the procurement and allocation of resources to all three services. This includes ammunition, POL, repair parts, rations, clothing, transportation, heavy equipment, personal equipment, medical and veterinary services, post exchanges, research and development, storage, issue, and maintenance. This headquarters forecasts, requests, coordinates, stockpiles, and oversees the distribution of all logistics support to military regions. It monitors the placement of the logistics to ensure supply bases and repair facilities are established as far forward as possible to facilitate the flow of supplies from the national logistics level directly to combat units.

At each subordinate level down through brigade, OPFOR commands have a chief of the rear. He is a logistics branch-trained officer, directly subordinate to his commander. At region, army, district, and division, he is also the rear area commander. His assumption of responsibility for rear area operations permits the commander to

devote his full energies to combat operations.

National Rear Depots

Rear depots are part of the national logistics support structure and hold the national reserves. They occupy fixed peacetime facilities, plus dispersal sites in the capital district. They manage distribution of war stocks, domestically produced armaments, and any higher-level repair work that is accomplished in-country. Examples of these repairs include aircraft instrumentation, optics, and electronics. They manage the distribution of consumables such as fuel, food, and other items from the civilian economy to the military region. Rocket and missile troops, aviation support units, and SAM maintenance units are supported directly from their depot.

Operational-Tactical Logistics Support

The operational-tactical aspect of the OPFOR logistics support concept encompasses all military logistics support requirements at the operational and tactical levels. Military regions and the expeditionary army are considered operational level. Military districts, divisions, and below are considered tactical. In order to keep the logistics support concept as simple as possible, operational-tactical support will be addressed in two parts: **peacetime** logistics support and **wartime** logistics support.

PEACETIME LOGISTICS SUPPORT

The logistics system of the State during peacetime is designed to--

- Sustain the OPFOR during peacetime.
- Provide an in-place logistics support structure ensuring a rapid transition to war during mobilization.
- Provide for the planning and execution of force movement and maintenance of combat equipment.

There are two major differences between the OPFOR peacetime logistics system and the wartime logistics system. They are--

- The military region logistics bases and depots are not fully manned or stocked during peacetime.
- During peacetime the OPFOR does not have to support the expeditionary army. The expeditionary army is only formed upon mobilization.

Command and Control

The command and control of logistics elements during peacetime, although at a smaller scale, mirrors that of the wartime logistics structure.

Organization

The peacetime logistics structure serves as a baseline for the OPFOR when mobilized. Most of the logistics "bases" and depots are fixed, minimally manned and stocked. These bases and depots provide the core to upgrade to wartime requirements. They serve as the receptor of supplies and war materiel flowing from the rear depot.

National Rear Depots

The rear depots hold the national reserves and begins the "forward distribution" upon mobilization. The rear depots are fixed facilities. Their functions during

peacetime and war are basically the same. They serve as a conduit between national and operational-level logistics.

Military Region Logistics Base-Peacetime

The primary mission of the military region is the defense of the State. Operational logistics functions are conducted by military region logistic support elements. The fully functioning **region logistics base** is designed to support military districts in the defense of the region. The military region is the highest-level military territorial administrative command. It includes recruiting districts, military schools, and garrisons. Support activities in the operational rear area are conducted mainly from fixed or semi-fixed logistics installations. These logistic bases are composed of materiel support and maintenance units, and field hospitals.

The region logistics base consists of one or more depots, a materiel support brigade and one or two maintenance battalions. (See Figure 9-2.) The bulk of peacetime logistics support revolves around the military region, the same as during war. The region not only receives supplies from the national rear depots; it has the ability to draw on stockpiles and caches within the region. This is the primary logistics facility of the region and is usually located in the region capital. In peacetime, each region has a series of forward depots to sustain the military in the region and to manage the allocation of national and district supplies during hostilities. The depots are dispersed throughout the region to enhance survivability and to provide quicker service to the force. Supplies in regional depots may be passed to districts and separate brigades. The functioning peacetime supply system in

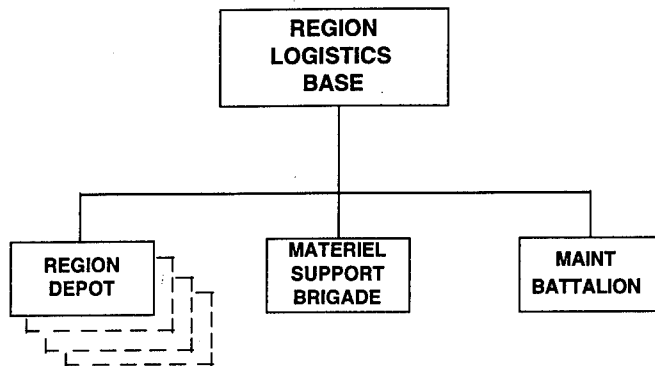
all military regions is reinforced at key points upon mobilization. The peacetime region logistics base serves as the core of the wartime region logistics base. The base may be augmented by a field hospital, additional maintenance battalions, and other units as the military region commander requires. The base is normally located near a region capital well out of long-range artillery fire of the enemy (50 to 100 km from the forward edge.).

Military District Logistics Base-Peacetime

The primary mission of the military district, in peace and war, is the defense of the State. In peacetime, the logistics system is designed to sustain military units in the district and aids in the transition to war.

In peacetime, materiel support battalions serve as the core to form **district bases**. Upon mobilization the materiel support battalions are augmented with additional materiel support battalions, maintenance and medical battalion(s), and other units the district commander determines. (See Figure 9-3).

The **region depot(s)** are located in military districts, however, they are directly subordinate to the military region, not the military district in which they are located. The mission of the military region requires its depots be widely dispersed throughout the region. The depots may receive supplies and other support from or through the district logistics base, or they may receive support directly from the military region base.



NOTES:

1. In peacetime, one maintenance battalion provides maintenance support. Additional battalions or an entire maintenance brigade may be allocated upon mobilization.
2. In peacetime the region logistics base is minimally manned and stocked.

Figure 9-2. Military region logistics base-peacetime.

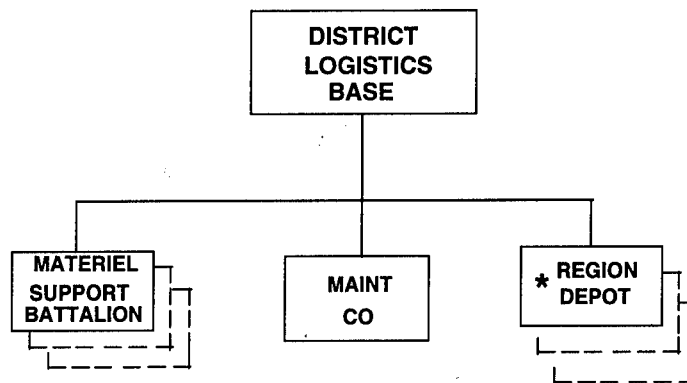


Figure 9-3. District logistics base structure.

WARTIME LOGISTICS SUPPORT

Military Region Logistics Base-Wartime

The primary mission of the military region during war is the same as it is during peace-defense of the State. During war, however, the military region may be designated to provide logistical support to an expeditionary army. Only one military region would be tasked to provide this support, since the OPFOR can only raise one army. The region the army launches its attack from

generally provides the required logistics support.

Upon receiving the order to mobilize two things happen concurrently:

- The national rear depot starts the "forward distribution" of stockpiled war materiel down to the region logistics bases.
- Military region logistics bases begin the transformation from minimal manning and stocking to full wartime capacity.

Predetermined wartime logistics requirements determine the wartime structure and

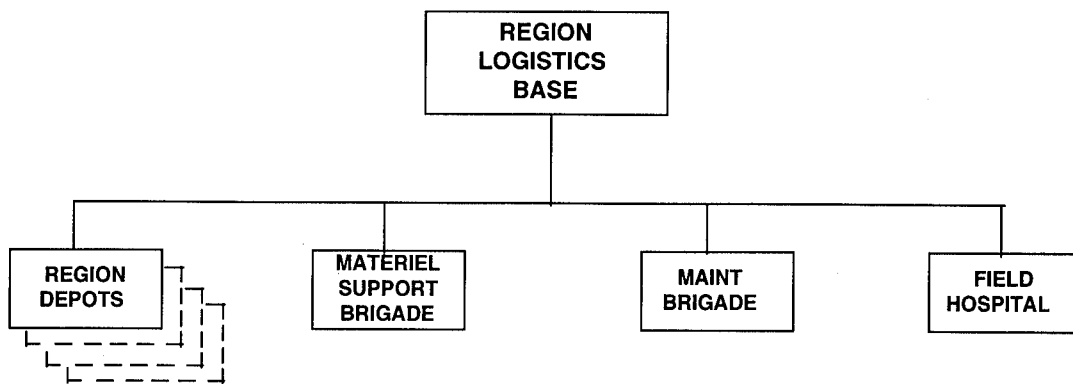


Figure 9-4. Region logistics base-wartime.

capability of each region logistics base. This process is further explained in Figure 9-4.

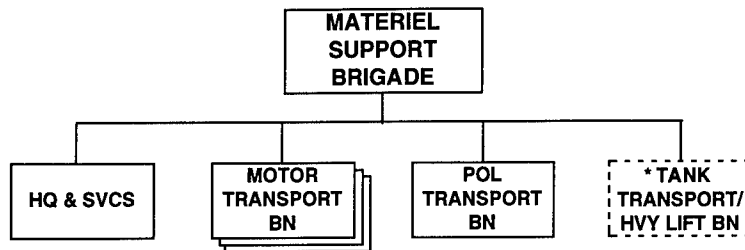
Military region logistics bases are the principal points of delivery for materiel and equipment issued from the national rear depots. The rear depots are not the only source for supply. Some materiel and supply would come from inside the region. It would be centralized at the region logistics base for distribution. Most items are received, stored, and prepared for release to combat units. Combat units within the region will generally receive supplies through region depots scattered throughout the region. Wartime support chains are similar to those in peacetime.

The military region provides command and control for assigned logistics missions and other support functions. It also serves as the mobilization base or center. Returned equipment, stragglers, and wounded are reassigned to refitting or mobilizing units and incorporated into the force. Maintenance and medical support are similar to those available in peacetime, depending on how the commander configures the region logistic base.

Rear Area Commander

If the region has an offensive contingency mission, an **expeditionary army** headquarters may be formed. When it is formed, the region commander would locate with the army headquarters. The region commander remains at the military region headquarters and serves as the rear area commander responsible for region, security, mobilization, and militia employment and for logistics, maintenance, and transportation. When not involved in the defense of the region, his primary mission is to support the expeditionary army when it is forward. The military region depot(s) function as the rear logistics base for the army. The military region rear area commander also coordinates the allocation of additional combat support assets received from the General Staff and combat service support for the expeditionary army and coordinates for the transportation and distribution of all logistics resources. Under his control, motor transport assets are centralized for operational employment, especially in a pre-offensive buildup and for resupply of advancing units.

At the military region, the rear area commander (the former deputy region commander) has varying degrees of authority for



NOTE: * A tank transport/heavy-lift battalion, equipped with heavy equipment transporters is attached to the materiel support brigade supporting an expeditionary army.

Figure 9-5. Materiel support brigade.

accomplishing the following rear area functions:

- Controlling rear area security, including control of combat elements tasked to provide rear area security.
- Tasking directorates with specific support missions.
- Assigning deployment areas to support units in the rear area.
- Coordinating with subordinate chiefs of the rear and branch chiefs of tank, rocket troops and artillery, and transportation for rear area support in their respective areas.
- Issuing instructions to subordinate chiefs of the rear about the administration of support activities.

Materiel Support Brigades

Materiel support brigades are allocated from the national level. As stated above, in peacetime, they serve as the core region logistics bases are formed around. They also serve as the core to form the expeditionary army mobile logistics base. Military district's materiel support battalions serve as the core to form district bases. Brigades and battalions establish trains.

The materiel support brigade is composed of three motor transport battalions

(dedicated to the delivery of specific supply items to the divisions, or separate brigades, and to relocating the materiel support brigade); a POL transportation battalion; possibly a tank transport/heavy-lift battalion; engineering and servicing functions; specialized rear service equipment repair units; mobile field bakeries; and other elements. (See Figure 9-5.)

Military District Logistics Bases-Wartime

During wartime the **district logistics base** is designed to support separate infantry brigades in the defense of the region. It is structured basically the same as in peacetime. The final structure of the district logistics base is determined by the district commander. (See Figure 9-6.)

The district base receives supplies from the region base, augmented from stocks in the district arsenals and depots. In emergencies, adjacent districts may provide additional materiel. The district base is generally located in a district capital and performs most intermediate-level maintenance. It is also the first echelon able to provide complete medical care often operating from fixed medical facilities.

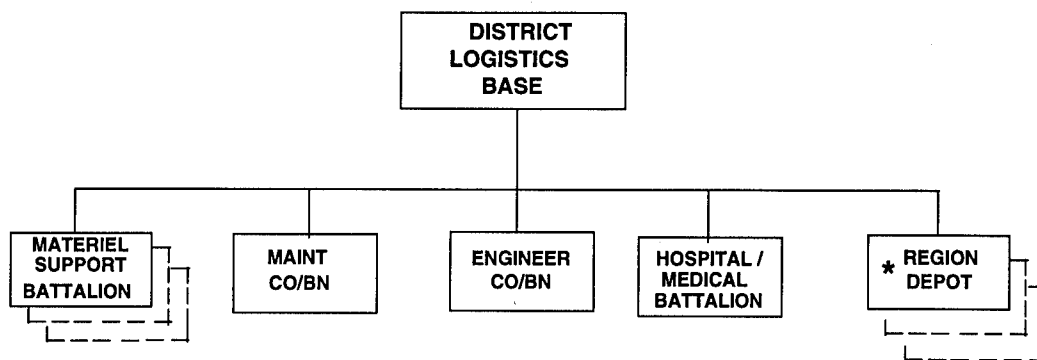


Figure 9-6. District logistics base - wartime structure.

Fuel and ammunition convoys are routed out to the brigades. If road conditions do not allow delivery by commercial type trucks, supplies are shifted to tactical transport here. The materiel support battalion controls all non-engineer local labor assets.

Army Materiel Support - Wartime

Upon receiving the order to mobilize, under-strength logistics units at all levels are filled out with personnel and equipment. Much of this is mobilized from the civilian sector. The priority task for the logistics elements is to support the mobilization deployment of the expeditionary army, to include their movement to forward attack positions or other designated located by all forms of transportation. Maintenance and medical support are discussed separately in this chapter.

Command and Control

As with the region, the expeditionary army has a **chief of the rear** who also serves as the deputy commander for the rear/rear area commander. This is the commander of the materiel support brigade supporting the army. Due to movement of forces, his responsibilities differ from region and district counterparts.

Materiel Support

The expeditionary army is allocated a **materiel support brigade** from national level. This brigade serves as the core to form the **army mobile logistics base**. (See Figure 9-7) The army mobile logistics base is only a wartime element, since the army only exists in wartime. It performs the function of a region logistics base forward. The mobile logistics base provides the same support and is structured similarly to the region logistics base. The army mobile logistics base maintains materiel stocks capable of sustaining its subordinate divisions for two to three days. The army mobile logistics base consists of rapidly relocatable depots holding all types of supplies; motor transport battalions and companies dedicated to the delivery of specific supply items to the army and the relocation of brigade assets.

The army mobile logistics base is linked to a specific military region. In addition to logistics, the supporting military region also provides security for the LOC and other rear area support (see "Rear Area Security" later in this chapter). The army mobile logistics base is linked to the supporting military region depots almost entirely by motor transport. Ninety percent or more of the materiel is transported by this means. About five percent of materiel is

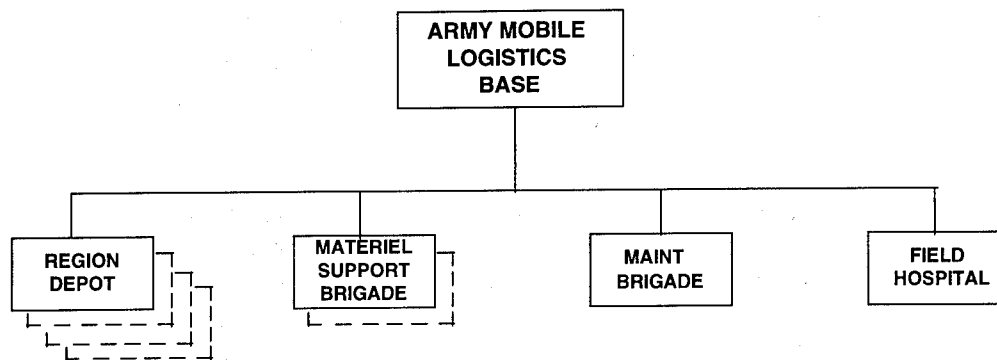


Figure 9-7. Expeditionary army mobile logistics base.

delivered to the army rear by air. Approximately 40 percent of the supplies to be transported would be ammunition, 40 percent would be POL, and the remaining 20 percent would be rations, medical equipment, and other general cargo, i.e., repair parts, tents, and clothing.

The army mobile logistics base deploys initially about 60 to 80 km from the rear areas of the divisions it supports. Components of the base may be positioned far closer to the divisions as required. This allows the army mobile logistics base to resupply tactical maneuver units through the divisions' materiel support battalions.

The army mobile logistics base follows the army at distances not exceeding 125 km, which is approximately a half-day's trip for motor transport. This requires major elements of the army mobile logistics base to relocate forward every two to three days, and more often when advance rates are faster. With the exception of a small amount of critical supplies delivered by air, nearly all materiel is delivered to the divisions by road. Army forward detachments, airborne operations, air assaults, special operations, and other forces operating in isolation from the main body of troops must rely on accompanying task-organized logistics support packages and aerial resupply.

Each higher echelon is responsible for the timely and complete provision of logistic support. Accordingly, logistics organizations and resources are found at each echelon. Division supplies are carried in the materiel support battalion. Army materiel support units form mobile logistics bases that leapfrog forward with the army. The "forward distribution" system in use by the OPFOR allows the delivery of supplies when and where they are needed. This system ensures lower-echelon maneuver units are not encumbered with having to carry ammo, POL, and rations to sustain themselves for an unrealistic amount of time.

OPFOR combat units must have the capability to carry **mobile stocks**. Units at each echelon are expected to carry a combination of supplies enabling them to perform their mission without resupply for a specific period of time. These are distributed with some at each echelon beginning with basic loads on combat vehicles to trains at battalion and brigade. However, the supply system is expected to move forward and deliver commodities daily. The supply interval during intense combat may be a half day for a lead mechanized battalion and possibly several days for a division. This means some battalions must be resupplied at least two times a day and divisions resupplied at least every two days. Companies may need

<u>UNIT</u>	<u>ORGANIC COMBAT SUSTAINABILITY</u>	<u>LOCATION</u>
COMPANY & BATTALION	1/2-1 Days	On-Board
BRIGADE	1-2 Days	Materiel Support Company
DIVISION	1-2 Days	Materiel Support Battalion
ARMY	2 Days	Materiel Support Brigade
TOTAL	4 1/2 - 7 Days	

Figure 9-8. Army combat sustainability.

resupply more often, depending on the tempo of the battle. To maintain the offensive momentum, certain supplies (ammunition, POL, and medical) are delivered daily when possible. Upon commitment of a division to combat, all classes of supplies are relocated as far forward as possible.

Tactical Logistics Support: Division and lower

The tactical rear is at military district, division, and lower. Tactical rear area operations meet the immediate combat needs of supported units.

Organization

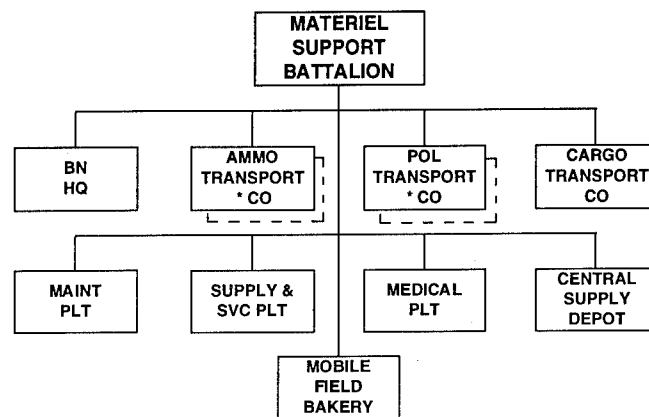
The OPFOR tactical logistics organization is composed of materiel support battalions, maintenance battalions, and medical battalions at the military district and division level. (See Figure 9-9 for the structure of a materiel support battalion.) Brigades have

materiel support companies and medical platoons. (See Figure 9-11 for the structure of a materiel support company.)

Military regions and districts are backed by supply points and bases. Materiel support units are responsible for the transport, storage, and distribution of supplies. Maintenance units handle equipment maintenance, but all repair parts are received through the materiel support units. Logistics bases are composed of a wide range of specialized company-size depots and subunits. Depots are responsible for both branch-specific supply storage and issue as well as maintenance of branch specific-equipment.

Division, Brigade and Battalion Trains

Units at each echelon carry a combination of supplies enabling them to perform their mission without resupply for a specific period of time. However, the supply system is expected to move forward and deliver



NOTE: * Mechanized divisions have 2 ammunition transport companies and 2 POL transport companies.

Figure 9-9. Materiel support battalion, district, division, and national.

commodities daily. See the discussion on sustainability above. Figure 9-10 shows the locations of tactical logistics elements during an expeditionary army offensive.

A division deploys to the field with its entire initial supply. Additional supplies are issued either from the division trains, or if a separate brigade, from district. The additional stocks are brought forward and stockpiled at the trains site, to be issued daily to the committed battalions.

Tactical combat service support elements are completely mobile. Division materiel support battalions move forward one or twice a day behind first-echelon brigades, consolidating major battalion elements at the end of each 24-hour period. From the division trains, the supplies are moved to the brigade trains. Supplies at brigade, like those at division, are maintained on vehicles. With the supplies carried for organic elements and those maintained for use by subordinate units, the brigade is able to conduct combat for 3 to 4 days. From the brigade trains, organic cargo vehicles transport supplies to the subordinate battalions. Sec-

ond echelon divisions may be directed to pick up their own supplies with organic transportation assets, thereby releasing materiel support brigade vehicles to support the priority first echelon divisions.

Ammunition is delivered to the division trains from the army materiel support brigade, where a portion of it is maintained on cargo vehicles for delivery to subordinate brigades. These ammunition stocks are planned to last the division from 3 to 5 days. In preparation for offensive operations, additional ammunition would be stockpiled at the materiel support brigade for immediate access and use by each echelon from company/battery up through army.

A complete base load of ammunition is maintained with the weapon system as with tanks, self-propelled artillery and anti-aircraft guns. A specific amount of ammunition is maintained at each higher echelon from battalion through the military region supporting the expeditionary army. This is in addition to the ammunition in a combat unit (battery/company) designated for each organic weapon.

A minimum of 3 to 5 days of mobile fuel stocks are carried at division level. Movement of **POL** to brigades is performed by the divisional materiel support battalion or, in emergencies, by the brigade materiel support company. The **POL** is not off-loaded or transferred. **POL** supplies are delivered directly to vehicles at brigade and below.

In emergencies, fuel and tank and artillery ammunition may be hauled by both brigade and battalion trucks. The brigade trains establish an ammunition supply point, a fueling point, a general supply point, vehicle maintenance team, an ordnance repair

team, a medical clearing/ambulance section, and a transportation and equipment evacuation section. Brigade and battalion maintenance consists of minor automotive and ordnance repair and parts replacement only; all else must be evacuated to the district or division. Operator maintenance is performed in the field.

The location of the battalion trains is designated by the unit commander. Stocks maintained at battalion include ammunition, **POL**, rations, and other high-expenditure items. These items are delivered to the companies and batteries by armored personnel carriers (APCs) or supply bearers.

EXPEDITIONARY ARMY IN THE OFFENSE		
UNIT	LOGISTIC ELEMENT	DISTANCE FROM FEBA
COMPANY	Ammunition Supply Point Ration Supply Point Medical Point	
BATTALION	Battalion Trains Ammunition Supply Point Vehicle Repair Point Ration Supply Point Medical Section	4-5 KM 4-5 KM 4-5 KM 4-5 KM 1.5-3 KM
BRIGADE	Brigade Trains (Material Support Bn) Ammunition Supply Point Repair Point POL Supply Point Ration Supply Point Medical Platoon Damaged Motor Vehicle Collecting Point	10-15 KM 10-15 KM 10-15 KM 10-15 KM 10-15 KM 5-7 KM 5-7 KM 5-7 KM
DIVISION	Division Trains (Material Support Bn) (Maintenance Bn) Supply (Ammunition, POL, Rations) Repair Point (Tanks, Weapons) Repair Point (Wheeled Motor Vehicles) Medical Battalion	20-30 KM 20-30 KM 20-40 KM 10-14 KM 10-14 KM

Figure 9-10. Locations of tactical logistics elements.

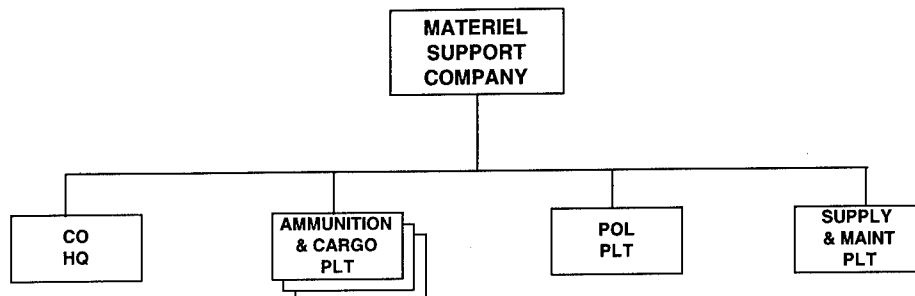


Figure 9-11. Materiel support company, brigades.

At **tank and infantry battalion level**, the commander is assisted by the following personnel:

- **The battalion chief of staff** (similar to U.S. battalion executive officer) is the principal assistant for organizing and administering battalion rear area operations.
- **The battalion maintenance officer** is responsible for organization and control of maintenance, repair, and salvage of both combat and noncombat vehicles.
- **The battalion service platoon commander** orders, stores, and distributes all supplies and equipment. He commands a service platoon consisting of a mess section, a motor transport section, and a supply and service section. The motor transport section operates the battalion's cargo (ammunition) and POL trucks.

At **company level**, a company maintenance officer assists the commander in logistics. The company maintenance officer supervises weapons crews in field maintenance and light repair. He also is assisted by a company first sergeant who is accountable for company-level supply.

MAINTENANCE

Maintenance Brigades

Maintenance brigades are also allocated from the national level. (See Figure 9-12.) One or two maintenance battalions are located at the region depot in peacetime. (See Figure 9-13.) During mobilization, however, additional elements of the maintenance brigade may be allocated to establish the region base. An equipment receiving and maintenance return collection point and a maintenance unit reconstitution point are established at the region base.

At the **division level**, the **maintenance battalion** is responsible for all repair work, and is divided into three commodity-oriented companies (for armored vehicles, wheeled vehicles, and artillery) and an evacuation platoon. (See Figure 9-13.)

The **army maintenance brigade** is co-located with the army materiel support brigade, about 60 to 80 km from the rear areas of the supported divisions. This allows the army maintenance brigade to resupply tactical maneuver units by using the division's materiel support battalions.

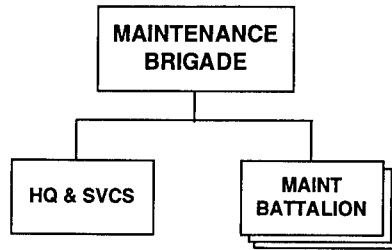
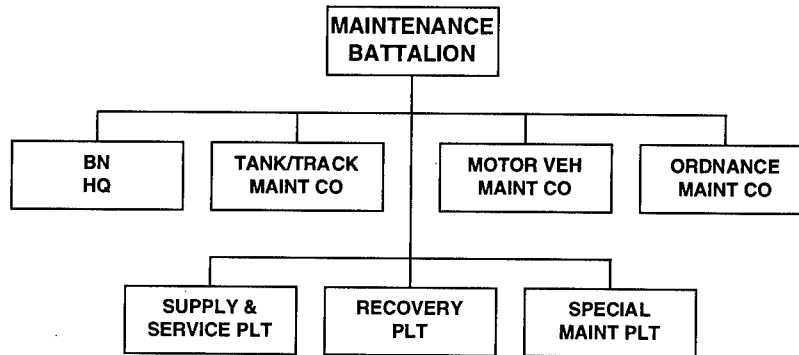


Figure 9-12. Maintenance brigade, army and national.



NOTES:

1. Mechanized infantry divisions and army would have three tank/track maintenance companies and one motor vehicle maintenance company.
2. Light infantry divisions and motorized infantry divisions normally have two motor vehicle maintenance companies and one tank/track maintenance company. Light infantry divisions may only have one of each type.
3. Maintenance battalions at the national level are a mixture of the two variants.

Figure 9-13. Maintenance battalion, division, army and national.

During combat, repairs are performed using mobile repair teams. Emphasis is given to those items requiring the least amount of work. All vehicle and weapons crews accompany their equipment back through evacuation channels and assist in the repair of their equipment, unless the equipment is considered to need major overhaul. In the offense, the division repair point for tanks and weapons is located 20 to 40 km from the forward edge, while the divisional wheeled motor vehicle repair point is located from 10 to 14 km from the forward edge.

FORCE RECONSTITUTION

Military regions, as mobilization centers, are the primary location where **reconstitution** occurs. Individual replacements, returned equipment, stragglers, and wounded are reassigned to attrited battalions (which are then assigned to existing brigades). Battalions serve as the base unit for reconstitution.

Reorganization occurs at brigade level. As brigades experience combat losses, the commander must decide whether to reorganize or to withdraw a subunit for

reconstitution. Brigades normally reorganize their battalions internally when attrited to half strength. Two battalions may then be consolidated, or the weakened battalion may be pulled off the line and sent back to be reconstituted. The battalion would withdraw along the LOC toward the district base. It establishes an encampment, and awaits replacements. If engaged, it would assume a positional defense. The brigade would also establish provisional infantry companies with returned wounded, stragglers, and from the assets of smaller subunits that have lost their primary equipment, such as engineers, air defense, and service troops.

Aviation, artillery, SAM, rocket, and missile brigades may internally reorganize, as long as they maintain the remaining firing subunits each at no less than half strength; otherwise the depleted subunits are evacuated. Damaged equipment and wounded personnel in these specialties are evacuated to the region logistics base to be reformed into like subunits, if they can be returned to service within the expected duration of the campaign. Otherwise, the equipment is dumped at the maintenance facility where that determination has been made and cannibalized for spares. Capable crew members and still serviceable equipment are sent as fillers to like or similar units.

MEDICAL

The two principle missions of the OPFOR **military medical service** in combat are the evacuation and treatment of casualties, and the prevention of disease in the area of operations. The medical service also has responsibility for monitoring and maintaining adequate health conditions within the area of combat operations. The medical service is further responsible for the combat

readiness of the military medical staff of the OPFOR.

Evacuation and Treatment

In an effort to reduce the demands made on trained medical personnel, OPFOR combat medical doctrine emphasizes the importance of "self-help" and mutual aid among individual soldiers. The concept of self-help and mutual aid extends beyond the battlefield to the casualty collection points and the battalion aid station. Each soldier is equipped with a packet of field dressings and an NBC protection kit. He also receives a required number of hours of first-aid training each year and may be called upon to assist in treating wounded.

The basic principle of OPFOR combat medical support is **multistage evacuation with minimum treatment at each level**. From company through military region, each level has specific responsibilities for the care of the sick and wounded. (See Figure 9-14.) Besides treating the wounded, medical personnel handle virtually all of their own administration. As casualties move through the combat evacuation system, medical personnel at each level make effective use of medical facilities by repeated sorting of the wounded (triage). They treat the lightly wounded who can be returned to combat and those casualties who would not survive further evacuation without immediate medical attention.

The OPFOR combat medical doctrine stresses the timely return of recuperated sick and wounded to their units. Consequently, at each stage of evacuation medical personnel detain and accommodate those casualties whose expected recovery period falls within prescribed limits. Only casualties whose prognoses indicate extended

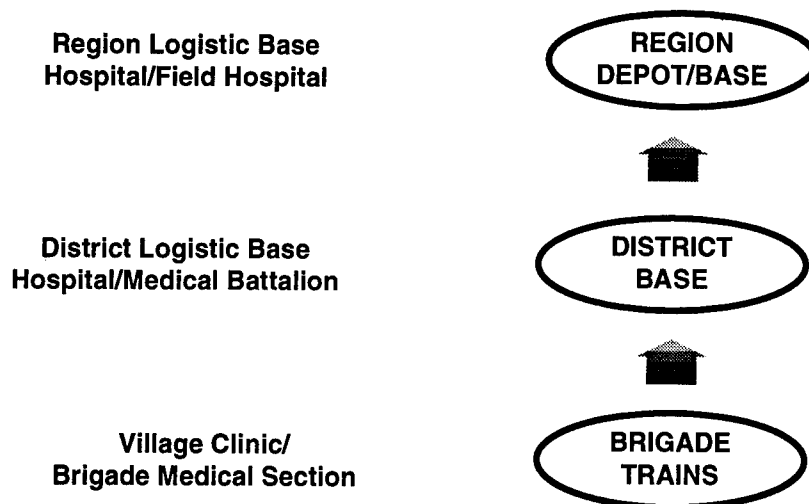
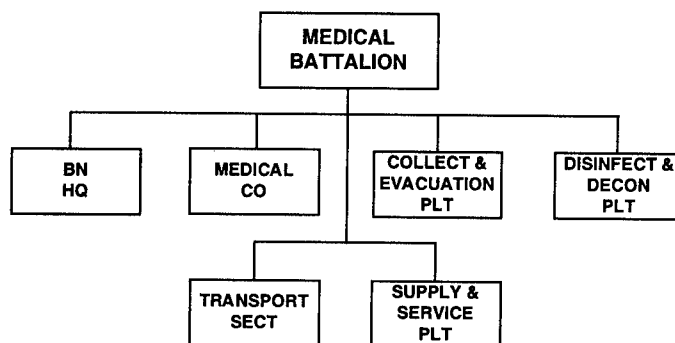


Figure 9-14. Medical evacuation, military region.



NOTES:

1. Medical battalions are planned at the national level, but are not part of the current structure. They would be allocated to regions and/or districts in wartime.
2. Only mechanized infantry divisions and the expeditionary army have medical battalions.

Figure 9-15. Medical battalion, division, army or national.

recovery periods reach a military region capital hospital.

The highest levels of the OPFOR medical support system are based on fixed military and civilian hospitals receiving patients from deployed field medical facilities and units. In the defense, fixed facilities, clinics, and hospitals in the military regions and districts augment the military medical

system. Civilian medical facilities are expanded during mobilization to meet the increased wartime needs. Whenever possible, casualties are sent to these civilian facilities. This is possible because the units are still in the State and receive support from the local populace. The expeditionary army in the offense relies solely on the military medical system.

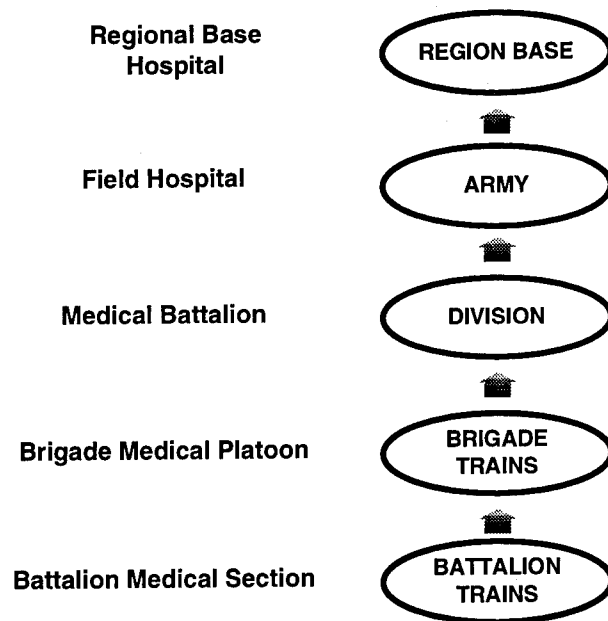


Figure 9-16. Medical evacuation, expeditionary army.

The expeditionary army deploy independent medical detachments and ambulance units to closely support first-echelon divisions. The **medical battalions** of each division (together with medical elements at lower elements) would be prepared to perform direct care and evacuation functions. This network of medical units and facilities provides medical support from tactical levels to permanent medical facilities deep in the State. (See Figure 9-16.) Deployed hospitals and units of forward field hospitals directly support army and divisional medical resources. These field hospital(s) are deployed in the areas of greatest casualties. They are generally deployed approximately 40 to 50 km from the forward edge.

Organic medical subunits support tactical units, divisions and below. The division has a small mobile hospital, while the **brigade medical platoon** is a sorting point, with either a doctor or physician's assistant. In the defense, the brigade medical platoon

would attempt to colocate with a village clinic. Patients requiring immediate evacuation to district are carried in ambulances. More routine cases and excess are backhauled in supply vehicles. Its ambulance element serves the battalion collection points. Air ambulance evacuation by helicopter or light aircraft from brigade is possible, but resource constrained. Supply trucks and stretcher bearers are used for excess casualty evacuation. All empty vehicles headed to the rear are used to evacuate casualties and freight. By using the supply forward system of dropping off supplies and going back to the rear for more, evacuation by motor vehicle is normally not a problem. Patients who are expected to be fit for duty within 72 hours are retained at brigade. If the brigade medical platoon displaces, these patients are turned over to the relieving unit or evacuated to the rear.

Battalion medical sections would have either a nurse or physician's assistant,

and smaller subunits have a corpsman. Casualties released as fit for service are returned to their units if the tempo of operations permits, otherwise they are added to reserve and mobilizing units.

Disease Prevention

To the OPFOR, prevention of disease primarily means field sanitation. Commanders are the executive authority for this, and a prescriptive regulation defines responsibilities down to the squad level. Medical personnel organic to the organization are responsible for this function. Disease is treated through normal medical channels.

REAR AREA SECURITY

To the OPFOR, rear area protection and security comprise the comprehensive coordination of more than just the rear of military forces in contact with the enemy. The OPFOR also believes that general war involves more than the armed forces fighting along established frontlines. Future wars will include wide-spread espionage, sabotage, infiltration, possible insurgent activities, and airborne and amphibious operations. Therefore, the OPFOR feels that total war will involve the total population.

Military Region Security

The military regions are the focal point for ensuring security of the State. Security and protection of the rear areas of the State are critical. These include providing security of vital installations, airfields, communications and transportation nets, critical industries, strategic weapons, LOCs, and large troop formations. To protect the State, the OPFOR has established an extensive program of organizations and proce-

dures to conduct rear area security within the State. In the event of war, its security program immediately goes into operation ensuring, among other things, the following:

- Rear area security and protection of combat, combat support, and combat service support units and areas of operation.
- Security and protection of LOCs.
- Security and protection of borders and coastlines.
- Mobilization of reserves.
- Civil defense.
- Suppression of local insurgents.
- Establishment of a rapid-reaction force (possibly commandos) to serve primarily as an antilanding force.
- Defense against unconventional warfare (including saboteurs, partisans, and propaganda).

The primary difference between rear area security in the military regions and rear area security of the expeditionary army is in the availability of forces. The **military region** is generally in a defensive posture within the boundaries of State; therefore it has the forces available to perform rear area security. Most of these forces are **not available to the expeditionary army**. These forces range from the militia, commandos, civil defense and police forces, to farmers protecting their land (and providing information). Although the commando's primary role is in counter-insurgency, they may also serve as a rapid-reaction or antilanding force. The militia may serve to secure bridges, crossing sites, or road intersections. They may also be used to occupy villages, small towns, and ports. Police forces can be used to for LOC security within the State by setting up check-points or serving as convoy security. In some instances, reserve units may be available. Other differences between region and army include the depth of the de-

fense fortifications within the military region and the availability of POL, ammunition, and resupply from depots and caches. The "will to fight" for the State also serves as a combat multiplier. The people view the defense of the State as a "die in place" battle. They would not surrender a foot of the Motherland while possessing a means to fight.

Military region logistics are structured to **support an expeditionary army** in the offense. When designated to support an expeditionary army the military region also assumes responsibility for providing security for the LOCs between the military region and the expeditionary army. This is essential in the survival of the army. Without this resupply line, the army would perish.

The LOCs may be secured, and therefore remain open, by several methods. One method would be for the military region to use militia forces as convoy security. The region commander may decide to use border patrol or police forces for this role or he may draw forces from an adjacent military district. He may also coordinate air support, artillery and reconnaissance. Reinforcements destined for the army may also be used in this role. In any event, however it is accomplished, LOC security remains the responsibility of the supporting military region commander.

Expeditionary Army Security

Non-organic forces are not available to the **expeditionary army**. They are available to the military region commander to provide security. The army is not only limited to using its organic units for security; it does not have the fortified defense positions the region has.

All units, from the smallest through army level, are responsible for the security of their own rear areas. In units brigade and higher, elements of the second echelon or the reserve provide security. The expeditionary army would always have either a second echelon or a reserve force. If the reserve force is committed, the army commander must establish another. Either the second-echelon force or the reserve may be used as a reaction force in the case of rear area incursions. The commander may also designate specific units to serve as a security force. These units may be light infantry, motorized, or mechanized brigades, tank battalions, antitank units, or other forces. The commander would determine the composition of the rear area reaction force based on his mission and committed forces.

Brigades and above have small staffs to coordinate the activities of all combat services upon elements at their respective levels. However, their basic command responsibility changes for rear area security. If requirements dictate, tactical units can be assigned rear area security missions under the operational control of the **chief of the rear**. There is no chief of the rear (deputy commander for the rear) lower than brigade. The unit commander below brigade is his own manager of rear area operations.

Organic personnel and equipment carry out basic security and damage control in the rear area. Appropriate measures include the following:

- Comprehensive security plans.
- Locating support units near combat troops for added protection.
- Temporary assignment of combat units as a reaction and antilanding force for rear area security. These are usually second-echelon elements.

- Employment of guards, sentries, and patrols.
- Emergency use of weapons and equipment undergoing repair. OPFOR crews generally remain with the equipment during repair under these conditions.
- Use of convalescent sick and wounded for defense during critical situations.
- At brigade and above, unit's air defense elements are located to provide thorough coverage of the entire area of operations. Combat support and combat service support elements also have rear area security responsibilities from the rear area of units in contact to the rear boundary.

COMMAND AND CONTROL

Rear area command and control is based on the commander's operational decisions. The commander may make these decisions or delegate this responsibility to his **chief of the rear**. Specific rear area decisions include--

- Designating deployment areas and direction of movement for rear service elements.
- Determining supply and evacuation points.
- Specifying medical and maintenance support.
- Establishing rear area security measures.
- Designating initial and subsequent locations of the rear CP.

The army **rear area commander** has a staff to assist in planning and providing rear area support. The staff coordinates with branch chiefs tasked with logistics functions and responsibilities. The rear area commander, together with branch chiefs, devel-

ops a rear area support plan based on the commander's decision and any instructions from the rear area commander of the next-higher level. This plan contains specific deployment and movement schedules for rear area elements, control and coordination measures for their activities, and measures for rear area security.

The rear area commander coordinates basic rear support matters with the unit's chief of staff and branch chiefs. He keeps them updated on the equipment status, the availability of reserves, and the medical support. The chief of staff, in turn, provides the rear area commander with timely information regarding the mission and the commander's decisions. The expeditionary army locates its rear CP from about 50 to 100 km behind the forward edge. In high-tempo offensive operations, expeditionary army rear CP moves frequently.

Division and brigade rear CPs are equipped with fully mobile communications facilities. Division rear CPs would be about 30 km behind the line of contact. Brigade rear CPs would be about 15 km behind the line of contact.

At division and brigade, the chief of the rear (deputy commander for the rear) supervises a staff that includes deputies for food; POL; and clothing. Coordination is made with engineer, signal, transportation, chemical, and ammunition directorates. Vehicle maintenance, repair, and recovery are the responsibility of the deputy commander for maintenance affairs. The repair of onboard weapons and associated equipment is the responsibility of the deputy commander for armaments. These activities are coordinated with the chief of the rear.

Rear CPs are established at all echelons from army to brigade. A rear CP must be able to communicate with the parent unit and with subordinate, adjacent, and higher rear CPs. CP personnel include the chief of the rear, his staff, and the communications, transportation, security, and traffic control troops.

Command and control of military region and military district rear operations are conducted from the rear area CPs. The military region and districts generally establish their rear CPs at the capital of the military region or district respectively. Although the CPs for the military region and military district rarely relocate, in emergencies they may be forced to relocate.

Chapter 10

Special Operations

This chapter describes the forces within the **Special Operations Command (SOC)** and provides a general overview of its missions. This chapter does not address other military and intelligence forces that would operate in the rear area during war-time, such as airborne and air assault infantry forces, various organic tactical reconnaissance units of the ground forces, and agents of the intelligence service whose primary mission is not special reconnaissance.

Special operations are conducted by specially trained, equipped and organized forces against strategic or tactical targets in pursuit of national military, political, economic or psychological objectives. These operations may be conducted during periods of peace or hostilities. They may support conventional operations, or they may be prosecuted independently when the use of conventional forces is either inappropriate or unfeasible.

Military operations, sometimes referred to as unconventional warfare, are a part of what the OPFOR calls special operations. The concept includes operational reconnaissance and special operations such as sabotage and small-unit tactics against selected targets in the enemy rear areas.

Special operations forces provide the OPFOR with flexible, lethal forces capable of employment in a variety of combat roles. Their missions range from destroying strategically important national objectives, and bringing the offensive and defensive fight well into the enemy's depth, to counter-

ing insurgents and guerrillas within the State.

DEFINITIONS

OPFOR special operations include:

- **Guerrilla warfare.** Military and paramilitary operations conducted in enemy-held or hostile territory by irregular, predominantly indigenous forces.
- **Insurgency.** An organized movement aimed at the overthrow of a constituted government through the use of subversion and armed conflict.
- **Counterinsurgency.** Military, paramilitary, political, economic, psychological, and civic actions taken by a government to defeat an insurgency.
- **Direct action.** An attack by special operations forces to damage or destroy targets or to kill or seize a person or persons. Examples of direct action missions OPFOR special operations may employ are assassination, abduction, hostage-taking, sabotage, ambushes, raids, and rescue.

SPECIAL OPERATIONS COMMAND

The SOC is a separate arm of the armed forces, directly subordinate to the General Staff, and co-equal of the Air Force and Navy. Special operations forces perform missions across the entire spectrum of conflict. Their operations consist of small-unit operations conducted by the most elite, motivated, and highly-trained troops in the

OPFOR ground forces. At the direction of the General Staff, the SOC conducts special operations in support of--

- Strategic objectives.
- Military region defensive operations.
- Expeditionary army offensive or defensive operations.
- Counterinsurgency operations within the State, both in peacetime and wartime.
- Guerrilla warfare/insurgencies in other countries.

The SOC consists of special operations brigades and commando battalions. (See Figure 10-1.)

The SOC Headquarters contains the command and control elements needed to conduct the special operations campaign. It coordinates the use of air and naval assets in the insertion/extraction of special operations teams and is the interface for artillery, air, and naval gunfire support to special operations. Liaison officers are temporarily assigned to any unit to ensure proper coordination. The headquarters integrates operations planning, intelligence and targeting, and the logistics support effort. Support requirements for special operations are nor-

mally fulfilled by resources outside the SOC. For example, air transportation requirements are fulfilled by Air Force assets and amphibious operations are supported by Navy assets. Should special operations forces require more traditional combat service support, these assets are provided through rear services.

SPECIAL OPERATIONS BRIGADES

The **special operations brigade** is the backbone of the SOC. Although organized in a brigade structure, these versatile forces are most often employed by **team**. Due to the variety of peacetime and wartime missions these brigades are called upon to perform, a single battalion may have forces executing a wide range of missions concurrently. Some special operations units can be assigned temporarily under the jurisdiction of other agencies for the execution of specific sensitive, short-duration missions. The basic structure of the special operations team and its inherent ability to operate independently simplifies its assignment under different commands. This reassignment can be

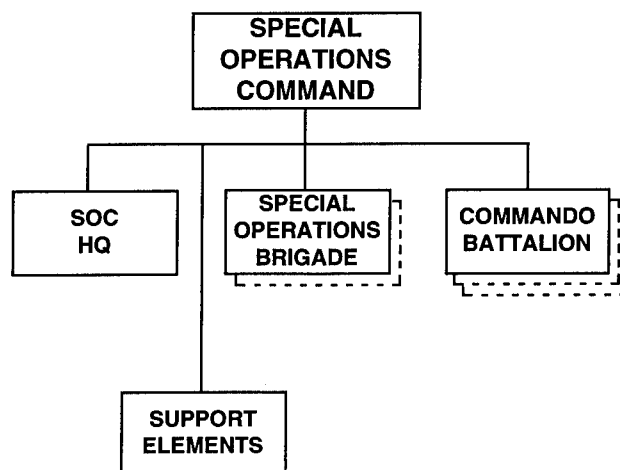


Figure 10-1. Special operations command.

performed very smoothly if the team retains its initial level of responsibility (strategic or operational) and its basic geographical (and linguistic) area of operations.

Composition

Each **special operations brigade** is composed of a headquarters company (anti-VIP) staffed entirely by career officers. These officers serve as team leaders for special missions or perform duties as support agents. These professional soldiers are at the highest state of combat readiness. They are the most qualified and best trained individuals in the unit and are all fluent in at least one foreign language. They can seek out and kill the enemy's political and military leaders, and execute any sensitive mission requiring exceptional skills. This is the only company that would come into contact with agents in the field.

Special operations brigades contain three special operations battalions, a signal company, an engineer company, and other support elements. These support elements are special transportation elements from other branches of the services, as mentioned above. (See Figure 10-2.)

Each special operations battalion can generate approximately 30 **teams**. Each team has an officer team leader, a senior NCO assistant team leader, a medic, and communications, demolitions, weapons, and reconnaissance specialists. Team organization and size can vary according to the specific mission. Average team size is 10 individuals.

Personnel and Training

Special operations soldiers are selected from the best of all the armed forces. The active duty ground forces provide the majority of these soldiers. Most of the soldiers come from airborne brigades or commando battalions. However, some Air Force or Navy soldiers with very specialized skills are also selected. Basic selection criteria include political reliability, physical prowess, experience, initiative and judgment. Foreign language speakers are actively recruited, as are those who have lived abroad. Many of the field grade officers have attended foreign staff or war colleges.

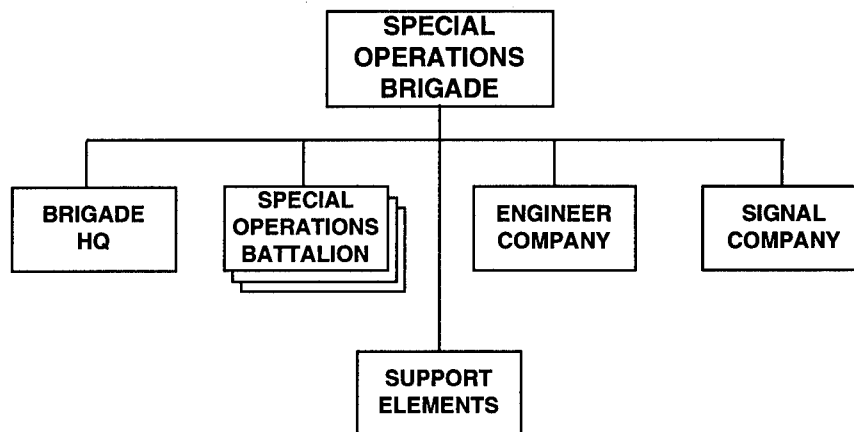


Figure 10-2. Special operations brigade.

Small groups of men are **trained as teams**. Each team has an officer in charge who speaks a foreign language fluently; a senior sergeant serves as second in command. Teams are organized, trained, and equipped for long-range and special reconnaissance, direct action, insertion, sabotage, diversion tactics, partisan support, and assassination missions. The special operations brigades also provide instructors, advisors, and liaison teams to train foreign guerrilla cadres. The following special skills are emphasized in training:

- Clandestine communications and operations.
- Tactics of infiltrating and exfiltrating the target area
- Night operational linkups.
- Sabotage methods using explosives, incendiaries, acids, and abrasives.
- Hand-to-hand combat and silent killing techniques.

Equipment

In addition to the standard weaponry and equipment normally associated with the organization, all varieties of OPFOR and enemy weapons and equipment are available to special operations personnel depending on their mission. Because of the clandestine nature of these missions and the distances behind enemy lines at which they plan to operate, special operations forces normally do not use combat vehicles during a mission. Instead, their small teams are outfitted with the best man-portable and airdroppable equipment available. Additional equipment can be air-dropped into the area and retrieved later by means of homing devices.

In most cases, these personnel would be dressed in their standard OPFOR uniforms. In support of certain strategic missions, such as assassinations, personnel

would be dressed either in foreign uniforms or civilian clothes. They could use indigenous civilian or military vehicles for transportation. Special operations teams could infiltrate by parachute, sea, or air landings, or penetrate borders disguised as civilians.

Missions

Special operations brigades are deployed throughout the enemy operational and operational-strategic depth in wartime. They conduct special operations--

- In support of strategic objectives.
- In support of military region defensive operations.
- In support of expeditionary army offensive or defensive operations.

Preparation

Special operations missions require intensive training and preparation. The OPFOR emphasizes the following factors when preparing for special missions:

- Absolute secrecy.
- Unity of command.
- Detailed planning and coordination.
- Detailed target lists with alternate objectives.
- Effective, secure communications.
- Survival behind enemy lines.
- Resupply from enemy stocks.
- Multiple destruction methods.
- Parachuting techniques.

Peacetime Operations

Agent networks in the target country support OPFOR special operations. The Ministry of the Interior (MININT) recruits agents in vital areas of the enemy's social structure. Political circles, intelligence services, all levels of the military, key industries, academic institutions, and the media

all provide good recruiting pools. Some of these agents actively engage in subversion, while others are "sleepers," prepared to act on call. Agents are trained to operate as political agitators, intelligence collectors, and saboteurs. MININT also recruits agents in the vicinity of military targets--airports, missile bases, arsenals, communication centers, logistic centers and depots, and also on routes used for troop movements. Just before the beginning of hostilities, OPFOR special operations units link up with agents already operating in the target area. Also, local guerrilla and other sympathetic groups may provide support.

Some **special operations teams** would be inserted into a target country where they would conduct intelligence and sabotage operations. They would also be used to organize, train, and direct local underground groups for clandestine unconventional operations. Some of these teams would remain in country until the end of hostilities. Clandestine special operations sabotage agents are less involved in the collection of intelligence. Their job is to assimilate into the local culture, establish residences near transport and power installations, and when ordered, emplace explosive charges in preselected targets.

Another important task for clandestine agents in peacetime is to acquire houses and plots of land to prepare **safe areas** where sabotage teams (civilian and military) can find refuge after landing behind enemy lines in times of hostilities. These safe areas are usually in the country, forested areas near the sea, or in the mountains. Special operations agents would be expected to provide incoming sabotage and assassination teams with safe areas, motor transport, fuel, and supplies, and guide the teams toward their objective. Both intelligence and sabo-

tage agents come under the command of senior intelligence officers and can be transferred from one category to the other at any time, or be ordered to fulfill both roles.

Transition to War

Before the start of hostilities, peacetime missions continue, and gradually shifting to operations designed to undermine or degrade the enemy's ability to effectively mobilize. These include--

- Strategic reconnaissance.
- Weakening military capabilities of the target country, either through subversion or direct action.
- Providing training and assistance to guerrillas operating in foreign countries.
- Organizing local guerrilla or partisan groups.
- Assassinating key military and political figures.

Support to Offensive Operations

The OPFOR appreciates the important role that special operations forces can play in support of an offensive. Their missions may be performed separately, in support of strategic objectives, or directly in support of the expeditionary army operation. Missions generally fall within the scope of the following actions:

- Direct action in the strategic or operational objective area, including ambushes, and raids (by teams).
- Deep reconnaissance operations.
- Disrupting enemy governmental and military control systems and centers.
- Destroying key economic targets, to include power stations, pipelines, oil and gas storage facilities, and electricity transmission lines.

- Destroying critical air defense systems and associated radars and early warning equipment.
- Supporting follow-on conventional military operations.
- Undermining national resistance.
- Assisting foreign guerrillas in preparation for OPFOR offensive operations.
- Intimidating and demoralizing the population. Operations in the enemy's rear are calculated to undermine the enemy's morale and spread panic among the civilian population and the political leadership. Refugees can hamper deployment, defensive maneuver and logistics. It is probably easier to destroy a government's will to continue the struggle, than it is to destroy its armed forces.
- Assassinating key military and political figures.

Support to Defensive Operations

The brigade may support either the expeditionary army or military region conducting defensive operations. Missions generally fall within the scope of the following actions:

- Deep reconnaissance.
- Direct action in the enemy's rear area, including, ambushes, and raids (by teams).
- Disrupting lines of communications, specifically command and control nodes, key logistics, ports, naval bases and airfields, and road and rail traffic.
- Sabotaging airfields, air defense sites, logistic depots and centers, railway lines, road and rail bridges, and communications systems.
- Destroying tactical logistic depots, especially fuel and ammunition.

This would probably include division and brigade trains to stop the tactical resupply flow.

- Providing communications, liaison, coordination, and command and control, to stay-behind units conducting partisan operations (military region defensive operations only).
- Conducting counterinsurgency operations. This is primarily a commando mission. However, special operations battalions may assist if it is necessary.

COMMANDO BATTALIONS

Commandos are elite light infantry units specially trained to hunt and find insurgents and guerrillas. They operate in areas with poor road networks on long range patrols, flushing guerrillas into other commando units or regular infantry units. In the performance of these missions, the commandos can be inserted by helicopter or naval craft.

Commando battalions were originally organized to combat insurgency within the State. As reflected by commando battalion subordination to the SOC, counterinsurgency is a Ministry of Defense (MINDEF) responsibility. MINDEF directs counterinsurgency operations, and coordinates with the MININT to ensure an integrated effort between counterinsurgency operations and concurrent, related MININT internal security operations. In the absence of an active insurgency, commando units have been trained to conduct other missions.

Commando battalions are found in the SOC and subordinate to some military districts. Organization and equipment of the two are identical. Missions and priorities are the same, except where noted.

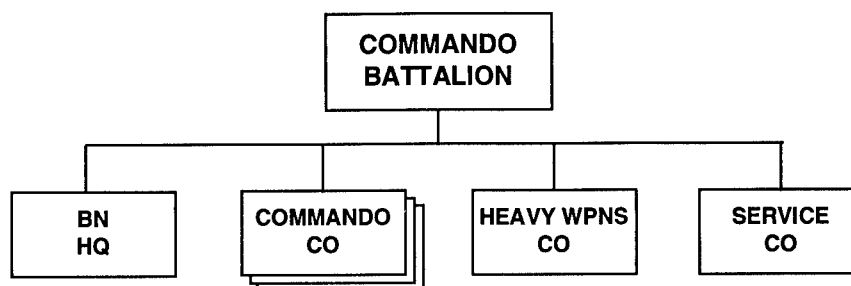


Figure 10-3. Commando battalion..

Composition

Commando battalions are organized with three commando companies, a heavy weapons company, and a service company. They are normally employed as a battalion or company, unlike the team employment of other special operations forces. Commandos are structurally similar and equipped much the same as regular motorized infantry units. However, the significant differences include the following:

- The battalion has an organic service company, which enables the battalion to perform more independently than standard motorized rifle battalions.
- Each commando company has an organic mortar platoon and burst-transmission communications capability.
- The heavy weapons company has, in addition to the mortar platoon and antitank platoon, a heavy machine-gun platoon and an automatic grenade launcher platoon.

Personnel and Training

Commandos are selected from the best of the ground forces, both active duty and reserve. Many commandos within SOC battalions previously served in commando battalions organized and trained within military districts. Therefore, most battalions

have first-hand knowledge and experience regarding the districts in which they may be employed. District commandos are normally formed within the district from a light or motorized infantry battalion already garrisoned there.

The same special skills taught to special operations brigade soldiers are taught to commandos, as well. Commando training includes a greater emphasis on patrolling and reconnaissance techniques, counterintelligence operations, and interrogation.

Equipment

Major equipment consists of 30-mm automatic grenade launchers, 60-mm and 82mm mortars, 73-mm recoilless antitank guns, manpack ATGMs, SAMs, 12.7-mm heavy machineguns, and night-vision devices.

Missions

Missions conducted by the commando battalions fall into three general categories: counterinsurgency, specialized infantry, and reconnaissance missions. Counterinsurgency is their primary mission. How and when they conduct their secondary missions depends on the degree of insurgent activity within the State, their command and control, and availability.

Counterinsurgency

Counterinsurgency operations are conducted to maintain the security of the State by denying foreign aggressors or counter-revolutionaries even the smallest foothold in a district or region. These operations are conducted both in peacetime and concurrently with a general war.

The **military district** is the focal point for counterinsurgency operations. The district commander is responsible for defending against all threats and the general pacification of the district. The district coordinates counterinsurgency efforts in its area; in wartime, it integrates those efforts with military operations. These military operations are conducted by the regular forces with augmentation from the militia. However, commandos have the lead in conducting counterinsurgency operations.

Most counterinsurgency operations are conducted by commando companies or battalions from the SOC, allocated to military districts for that specific mission for a specified period of time. Some districts with long-term or recurring insurgency problems have commando battalions permanently garrisoned within the district. These commando battalions have been formed within the district at the direction of the region commander, equipped by the General Staff at the request of the region commander, and trained by commandos from the SOC.

SOC Commandos

If the commando battalion(s) comes from the SOC, it is usually requested through the General Staff by the region commander. The battalion(s) is then placed under the operational control of the district commander. A region may have commando

battalions operating in more than one of its subordinate districts. The region's primary role is coordinating concurrent operations, operations which may cross district borders, and acting as a liaison between the SOC and the district in which the battalion(s) is operating.

The commandos favor the saturation patrolling technique, which may require augmentation from either regular forces or the militia. The saturation patrols are also referred to as a reconnaissance in force operation; they are specially designed to flush out the enemy. The operation is conducted similarly to the hammer and anvil tactic with other commando units, regular infantry, or militia serving as the anvil in various strong points. Patrolling commandos serve as the hammer driving the enemy into the anvil.

Once the insurgency problem is manageable by the district's own security forces (i.e., police), the commando battalion(s) returns to the SOC. During a state of general war, SOC commandos may conduct their secondary missions in support of an expeditionary army or military region operation.

District Commandos

A district may have a commando battalion permanently garrisoned if that district has a recurring insurgency problem. The battalion would be formed from a light or motorized infantry battalion already garrisoned within the district and trained by SOC commandos. Although trained and capable, these units normally cannot maintain the same state of readiness as SOC commandos. Once the insurgency diminishes or disappears, their special skills tend to atrophy. One advantage they have over SOC com-

mandos, however, is a much greater knowledge of the terrain and population.

District commandos primary mission is also counterinsurgency. Tactics and techniques mirror those described above for SOC commandos. However, unlike SOC commando units operating in a district, these commandos are more likely to be employed in their secondary roles. In conditions of general war, the district commander may shift them to conduct special light infantry operations or reconnaissance missions in support of the district battle. Depending on the situation, commandos from one district may be shifted to support counterinsurgent operations in an adjacent district at the request of the region commander.

Specialized Infantry Operations

Specialized infantry operations conducted by the commandos generally fall within the scope of the missions listed below. All commandos conduct these missions in the same manner. The scope of the mission is the major difference. SOC commandos are employed in support of operational or strategic objectives. District commandos, at the request of the region commander, may be employed in support of operational objectives. However, since they belong to the district, they are usually employed in support of the tactical missions of the district.

Direct Action

Direct action missions are either raids or ambushes. Raids are the most prob-

able. Both are usually conducted by commando companies. Primary targets include command and control facilities, communications nodes, airfields, artillery and air defense weapon and radar sites, and logistics facilities. Commandos may infiltrate overland, or be inserted by Air Force or Navy assets.

Rear Area Security

Commandos may be used as a rapid reaction force to protect critical facilities in the rear area. These missions are more probable in support of defenses conducted within the State. Sites would include major government and military facilities, airfields, ports, region and district rear area headquarters, and region-level logistics bases and depots. They may also be positioned near probable drop zones and landing zones to conduct anti-landing operations, responding to airborne or air assault threats.

Reconnaissance

Reconnaissance by commandos is normally conducted within the context of other mission, such as a raid. For example, an SOC commando company with the mission to destroy an enemy radar facility may be able to report on reserve locations or troop concentrations during the course of its exfiltration. If used solely for reconnaissance, commandos operate as either a reconnaissance detachment or group. Their structure and composition does not support team or platoon-sized employment as a standard reconnaissance patrol.

THIS PAGE INTENTIONALLY BLANK

Chapter 11

Airborne and Air Assault Operations

AIRBORNE OPERATIONS

Airborne and air assault forces rapidly deploy over great distances and conduct combined arms combat parachute or airlanding assaults to seize and secure vital objectives. These units are projected to virtually any objective area under almost any weather conditions. Once on the ground, their capabilities and lethality are similar to other light infantry units.

Airborne units train to fight across the range of military operations. They are particularly well suited to act as a rapid-reaction force. Their speed may make them the dominant force in fast-breaking operations. They can wrest the initiative early, seize and hold ground, and mass fires to stop the enemy in restrictive terrain.

The scope of airborne operations depends largely on the size and sophistication

of the enemy force. When facing a stronger **extra-regional power**, operations range from **company- to battalion-size**. Battalion-size operations are the most common. Company and battalion employment can be accomplished in one lift. Also, the tendency is to land in unopposed areas, move rapidly to the objective, and defend until linkup with ground forces. When facing a weaker **regional enemy**, operations range from **battalion- to brigade-size**. Brigade operations would require more than one lift. Since the OPFOR would have air superiority, missions would be executed to greater depths.

Organization

An **airborne infantry brigade** is organized as shown in Figure 11-1. It is completely self-sufficient and airdroppable.

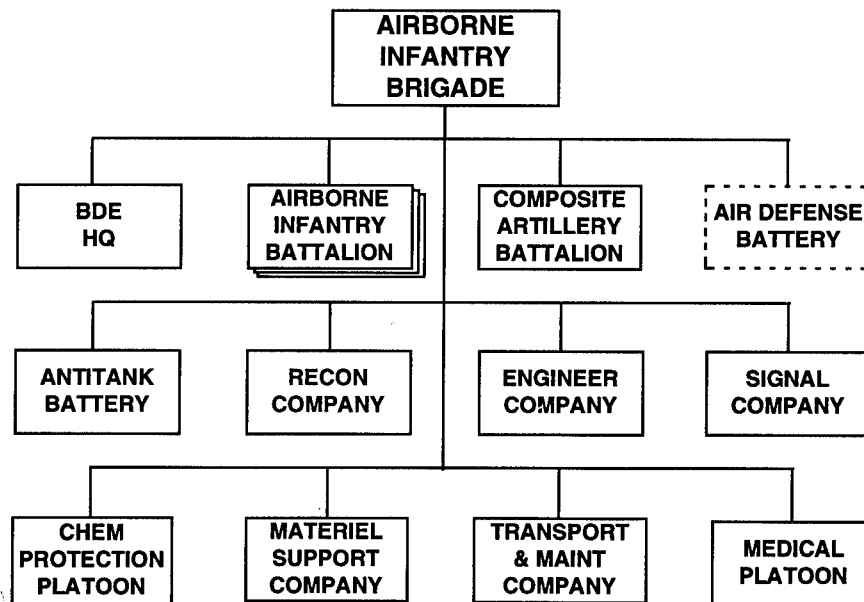


Figure 11-1. Airborne infantry brigade.

Should airborne forces require more traditional combat service support, such as wheeled transportation, these assets are provided through the rear services.

Command and Control

Airborne troops are separate from other ground forces. Like the Capital Defense Forces, they are directly subordinate to the General Staff. If required for a specified mission, the General Staff places them under operational control to the expeditionary army or a military region.

Missions

Airborne missions may be **strategic**, **operational**, or **tactical**. The depth of operation and the controlling headquarters determine the type of mission. **Strategic missions** are controlled by the General Staff. The outcome of a strategic mission is expected to have a significant impact on a war or campaign. Objectives could include national capitals, industrial or economic centers, ports, or airfields. **Operational and tactical missions** are controlled by the region or expeditionary army commander. The only thing which differentiates tactical from operational missions is depth. The following lists provide an overview of the scope of airborne operational and tactical support.

Airborne Support to the Offensive

In the offense, the OPFOR normally employs airborne forces to **support the expeditionary army**. The army commander establishes the airborne units' objectives and time of deployment. Probable missions include--

- Seizure of vital ground, bridgeheads, defiles, bridges, and commanding

ground in support of ground forces.

- Destruction or disruption of higher-level command, control and communications, political as well as military.
- Seizure of key terrain, such as islands or peninsulas, in conjunction with an amphibious landing.
- Blocking of routes used by enemy reserves moving forward or by groupings attempting to withdraw.
- Destruction of logistics installations, especially fuel and ammunition.
- Disruption of the enemy transportation infrastructure. This will be particularly important in the initial period of the war.

Airborne Support to the Defensive

Support to the **expeditionary army or region** conducting defensive operations may include--

- Envelopment of the enemy. This would relieve some pressure of the attack by mounting an assault on the enemy from the rear.
- Acting as an antilanding force. The mobility of the airborne troops makes them ideal to serve as a ready reaction force.
- Blocking routes used by enemy reserves moving forward or by grouping attempting to withdraw.
- Destruction of tactical logistic depots, especially fuel and ammunition. This would probably include division and brigade trains to stop the tactical resupply flow.
- Disruption of tactical transportation infrastructure. This disruption would stop reinforcements, fuel, and ammunition from being delivered.

Conduct of Airborne Operations

An OPFOR decision to use airborne forces is made after careful consideration. The OPFOR must believe that the mission has a reasonable chance of success. The success of an airborne operation depends upon air superiority, even if achieved only temporarily. Also essential is a favorable combat force ratio in the landing zones and objective area. The more powerful the enemy force in the projected operations area, the less likely the OPFOR would be to conduct an airborne assault.

Airborne operations are normally conducted in support of operational and strategic missions. An airborne brigade cannot be lifted at one time by the entire combined fixed- and rotary-wing fleet of the Air Force, including civil aircraft. This does not normally pose a problem since the majority of OPFOR airborne operations are conducted in battalion and company strengths. **Battalion-sized operations** are the most common.

If the entire brigade is needed for a single operation, airborne elements would have to be shuttled. The first airborne battalion would seize the airfield; follow-on forces would then be airlanded. The transport helicopter regiment can lift one battalion for airborne or air assault operations.

Principles of Airborne Operations

The following principles guide the conduct of airborne operations:

- Surprise is critical. Extensive security measures are used during all phases of the operation to prevent early detection and to minimize enemy reaction time. Night airborne assaults are a primary means of

achieving surprise.

- Landings must be made in either undefended areas or in areas where enemy defenses have been suppressed.
- Air cover for the formation must be effective for the entire route to the drop zone. Enemy air defenses must be suppressed along this route.
- Airborne assaults must be provided fire support by air strikes, missile strikes, and the artillery accompanying advancing ground forces as it comes in range.

Planning

An airborne operation requires extensive coordination between the controlling headquarters and the airborne force, supporting aviation, and ground maneuver forces. Planning considerations for OPFOR airborne operations include the **mission, troops and support available, terrain, the depth of the operation, flight routes, air superiority, drop zones (DZs), surprise, security, and the enemy situation**. The following actions are critical to successful planning:

- Determination of the composition, strength, and capabilities of the enemy forces in the DZ area (or those near enough to interfere with the landing operations and subsequent attack of objective).
- Determination of the nature of the terrain and condition of the road network.
- Location of natural and man-made obstacles that would interfere with airdrop of men and equipment.
- Selection of suitable primary and alternate DZs.

Flight routes are chosen to minimize flight time to the DZ. They also are planned

to minimize the threat of aerial intercept and ground air defense. Airborne unit marshaling areas are dispersed to prevent detection of an imminent operation and to reduce vulnerability to enemy air strikes. Conversely, marshaling areas must be close enough to departure airfields to make loading on aircraft easier. Normally, no more than a company can be expected in any one area.

During planning, the following limitations are considered:

- Range of the aircraft.
- Extent of air superiority.
- Size of the force to be dropped.
- Potential for reinforcement of the force.
- Anticipated enemy resistance, size, disposition, and composition.
- Rate of advance of friendly forces designated for linkup.

Preparation

Loading is accomplished so that lead aircraft over a DZ carry reconnaissance and security troops to secure the DZ. The security force is armed to defend against enemy air and armor attack. Main assault forces are loaded so that platoons, companies, and the battalion land with as much unit integrity as possible.

For security reasons, airdrops are planned to take place at night, whenever possible. Units normally move to departure areas after nightfall. Radio silence is observed in marshaling areas and while en route to and at departure airfields.

Air Movement

The **air movement phase** of an airborne operation is its most vulnerable phase. The necessity for creating a threat-free flight

corridor from the departure area to the DZ or landing zone (LZ) is emphasized. All along the flight path, known and suspected air defense systems on the chosen route and near the objective must be suppressed by artillery and ground-attack aircraft fire support. Fighters and fighter-bombers escort transport aircraft to protect them from enemy fighters and ground fires.

Protection of the air movement phase would be carefully coordinated. The assault force would use terrain cover wherever possible. During the flight to the DZ or LZ, aircraft fly in a formation that insures the proper jump sequence. The LZ would be thoroughly prepared if necessary, by artillery and/or air-delivered fire. Prior, possibly clandestine, ground reconnaissance would normally indicate whether or not an LZ is defended. Key personnel are in separate aircraft to insure that a unit's entire command structure would not be lost if one plane were shot down. Recognizing that local air superiority may be achieved for only a short period of time, the OPFOR prefers to accomplish the airdrop in one flight.

Passive defense measures taken during the air movement phase include conducting movement during hours of darkness, using more than one flight route, maintaining radio silence, and flying at low altitudes. Some radioelectronic combat measures may be used during air movement.

Airdrops

The OPFOR attempts to complete its airdrops before dawn. To simplify the airdrop, the OPFOR employs only one type of aircraft for each DZ. Combat airdrops are normally conducted at an altitude of 150 to 300 meters. The OPFOR emphasizes the necessity to drop at low altitude to minimize

the amount of time individuals are in the air. Low-altitude drops also increase the likelihood that a unit's personnel and equipment would land close together.

The first element to be dropped is a small **reconnaissance security force** responsible for eliminating enemy resistance in the DZ. The BRDM scout cars and crew-served weapons precede their respective personnel during the airdrop. The **main assault force** is dropped at least 15 minutes later. The OPFOR tries to complete the operation in one flight. However, if more than one flight is used, the first assault wave would contain forward command posts and crew-served air defense and antitank weapons, as well as maneuver units. The second wave would consist primarily of support elements.

The OPFOR has several methods for dropping cargo by parachute. Equipment weighing less than 30 kilograms (66 pounds) is dropped in padded containers. Equipment weighing up to 1,000 kilograms (2,200 pounds) is secured to standard cargo platforms. BRDMs, motor vehicles, artillery systems, and other heavy items may be secured to special shock-absorbing platforms and dropped by a multi-parachute system.

Drop Zone Procedures

The **airdrop and reorganization phase** at the DZ is considered to be the second-most vulnerable period in an airborne operation following the air movement phase. All actions taken at the DZ are to clear the DZ before an enemy force arrives.

A typical **battalion DZ** is 3 km by 4 km in order to maintain unit integrity; a **company DZ** is 1 km by 1 to 1.5 km. Alternate zones are designated for emergency use. Follow-on forces normally are dropped

into the zones used by the initial assault wave. DZs are as close to objectives as possible. The OPFOR prefers that DZs be within 20 km of the final objective. If circumstances permit, DZs are on the objective itself.

The **reconnaissance and security force's** immediate mission is to secure the DZ before the main body lands. This force, which could be up to a company for each DZ used in a battalion-sized airdrop, takes up defensive positions around the DZ's perimeter. Of special concern are the main enemy avenues of approach into the DZ. The force also establishes listening and observation posts beyond the DZ to provide early warning of an approaching enemy. Antitank and air defense weapons are integrated into the perimeter defense.

If the DZ is under strong enemy attack, personnel assemble and move immediately to the DZ perimeter to establish defensive positions. If the DZ is not on the objective and companies assemble first, they try to avoid combat with enemy units. They attempt to evade enemy ground forces and hide from an air threat.

The OPFOR considers an enemy air attack to be a serious threat to a landed airborne force. If required to actively defend against an air attack, at least one entire platoon or one company per battalion is assigned the mission. Besides crew-served and shoulder-fired air defense weapons, the OPFOR would use small arms fire, and even RPGs and ATGMs against air attack.

When an enemy threat against the DZ has been successfully neutralized or suppressed, units move to company assembly areas located either at the DZ boundary or a few hundred meters outside the DZ. If a

follow-on air landing is planned, the initial assault force leaves a rear detachment at the DZ to provide security and to assist in the landing of the follow-on force.

Attack

Commanders confirm their unit strength after the road march and raids, and receive enemy situation reports from their reconnaissance patrols. Because airborne operations are conducted within enemy territory and require speed and surprise, OPFOR commanders plan to conduct operations without full personal reconnaissance. After commanders have been updated on the situation, they refine the missions of their subordinate and attached units. Plans of attack almost always involve an envelopment.

Offensive tactics of airborne forces are similar to those of OPFOR infantry forces. Unlike raids, the attack at the final objective usually is conducted to overwhelm the enemy and to gain control of an enemy-held area or facility. **Final objectives** most common in OPFOR airborne exercises are river-crossing sites, airfields, and mountain passes.

The battalion normally departs the assembly area in prebattle formation. This consists of three companies arrayed in a line, wedge, or echelon. Company prebattle formation consists of three platoon columns with 150 to 200 meters between columns.

Before the attack, supporting units are deployed to provide maximum support. Attached artillery supports the airborne unit as it closes in on an objective. Engineer elements are positioned to move in quickly and sweep the area of obstacles. Air defense sections are positioned where they can engage attacking enemy aircraft or helicopters.

Battle formation normally is assumed within 1,000 meters of the objective, but subunits try to get as close as possible before deploying. About 200 meters is the minimum distance for deployment into battle formation. Before receiving the signal to attack, radios are in the "receive only" mode. Only the company commander and platoon leader can transmit messages. Once the attack begins, all radios can transmit and receive messages.

If the enemy is estimated to be weak, the airborne force may attack in one echelon. However, if the enemy is considered to be strong, the airborne force most likely would attack in two echelons. Since OPFOR airborne troops are basically a light infantry force, they must wait until supporting fires (direct and indirect) are in position before the attack.

Seizure of a river-crossing site typically takes place in the same manner. However, the commander adjusts his plans to account for the peculiarities of the mission. The reconnaissance patrol's mission is modified to include finding suitable crossing sites so that units can be deployed to seize key terrain on both sides of the river. Combat engineers also scout the river to determine its depth and width, speed of the current, river bottom characteristics, existence of floating obstacles and mines, riverbank composition and slope, and approaches on the river's far bank. Subunits also are designated to prevent the enemy's destruction of bridges or ferries during the attack.

An **airfield** probably would be seized using two axes of attack. In the attack plan, commanders designate units to seize the control tower, POL storage areas, and any radio beacon towers. In addition, designated units attack the enemy's main and

reserve security elements as well as any air defense crews situated around the airfield. The engineer attachment clears the airfield of enemy-emplaced mines. During the attack, the main force takes the control tower and destroys the airfield security force.

Defense

Once the airborne unit has seized its objective, its mission is to **defend the objective** until the arrival of forces advancing from the frontline. In almost all cases, it uses a 360-degree perimeter defense. Whether the defense is established in depth or with all units forward depends upon the enemy threat and the terrain. If the commander puts maximum power forward, he maintains a small mobile reserve. A battalion defense would keep no more than a platoon-sized element in reserve.

Defensive positions are built on a series of subunit strongpoints. A company is assigned a strongpoint within a battalion defensive position. The company may establish a defense in depth or a defense with all platoons forward. The company commander designs the defensive position so that ground avenues of approach are heavily defended by antitank weapons. He places shoulder-fired air defense weapons forward of the perimeter. The air defense sections are located on high ground so that an enemy air threat can be challenged before it reaches the company's position, or in the case of helicopter gunships, while it is firing from a distance. The company commander places obstacles and antitank weapons in intervals between platoons as well as between his company and adjacent companies.

Linkup

After completing their mission, air-

borne units either await a linkup with friendly forces or fight their way back to friendly lines. They would not be extracted by air. To accomplish linkup, the unit sends its reconnaissance element to meet advancing ground force units. The reconnaissance element provides information on the best approaches into the area, the security situation on the objective, and the enemy situation. Once linkup has been completed, operational control of the airborne unit returns to the General Staff. Control of the airborne troops remains with the General Staff for further disposition or missions.

AIR ASSAULT OPERATIONS

There are **no dedicated air assault units**. Light or motorized infantry units are normally designated as the air assault force to support operational or tactical missions. Based on the importance of the mission, and their availability, airborne troops, special operations teams, or commando companies or battalions may also perform air assaults. For any type of force, **company-sized** air assaults are the most common.

Air assaults can be used to conduct raids against vulnerable, **high-priority targets** such as headquarters, key logistics, and other high-value targets. They would be used to secure river-crossing sites and prepared but unoccupied counterattack positions well in the enemy's depth. In this way, they help convert tactical into operational success. This also allows the generation of operational momentum by blocking enemy reserves, or the withdrawal or redeployment of forces within artillery range, and by taking positions on which the enemy could fight delaying actions.

Air assault **depths** range from 10 to 15 km for company-sized forces up to 50 km

for battalion-sized forces. Both require an air corridor 2 to 4 km wide. Air assaults up to 50 km into the enemy rear area will require timely linkup with a forward detachment or elements from the first echelon of the attack.

Principals of Air Assault Operations

The following principles guide the conduct of air assault operations:

- Air assault planning must be rapid, thorough, and flexible to exploit fleeting opportunities.
- The LZ should be on or near the objective, which should be small and only lightly defended.
- The air assault force must be relatively lightly armed and requires non-organic fire support to accomplish its mission.
- Similar to airborne, the air assault requires air cover and air defense suppression.

Organization

With the exception of operations conducted by special operations or commando forces, regular light or motorized infantry battalions serve as the base organization. They would be tailored for air assault operations, eliminating assets not mission-essential. The battalion antitank platoon may be augmented. A sapper company, an antiaircraft battery, and a battery of towed artillery may be attached. Rear service personnel may be attached to provide supply of ammunition, medical supplies, and treatment, and to deal with any special problems for a given operation, such as supply of drinking water. A company or more of the divisional reconnaissance battalion may well be used for tactical air assault missions.

Special Equipment

Some light armored or wheeled vehicles can be included in the force for use as missile carriers and reconnaissance vehicles. An Mi-6/HOOK heavy transport helicopter is required to lift most of these vehicles. The number of Mi-6 sorties available limits the number of vehicles. With all augmentations and deletions considered (particularly deletion of APCs and most other battalion vehicles), the battalion assault force could contain over 500 troops. Most heliborne operations require at least a squadron and possibly a regiment of transport helicopters. These units belong to the Air Force.

Command and Control

A division or district commander is the lowest-ranking ground force officer which can organize an air assault operation. However, the army or military region commander must approve and coordinate helicopter assets with the Air Force.

The commander of the air assault force would be the commander of the battalion, company, or other units forming the basis for the assault force. The ground force commander is responsible for preparation and positioning the troops for loading. He shares with the aviation commander the decision to proceed with the landing, based on their assessment of the situation at the LZ. After the landing is made, the ground force commander is solely responsible for conducting the operation.

While the ground force commander may be able to refine the scheme of maneuver, most of the decisions required for the operation as a whole would have been made by higher authority. The operations plan is followed as closely as possible. Minimal

radio transmissions are a standard OPFOR procedure. Prearranged code words keep transmissions short and uninformative to the enemy. Color-coded signal flares and smoke are used.

The aviation commander's responsibilities include proper loading of troops and cargo in the pickup zone and navigation and tactics in the air. The ground and air commanders for the operation normally ride in the same helicopter, while their respective deputies ride in another helicopter. Ground and air officers work out conflicts in the mission planning process by negotiation, with appeal to higher authority in case of disputes. Air liaison officers in ground units help the aviation commander to identify the best approach and departure routes, and coordinate the helicopter activity with ground force air defenses.

Missions

Given the payload/range limitations and vulnerability of helicopters, most air assaults would be confined to the tactical and operational-tactical depth of the defense, though their significance may well be operational. In support of both offensive and defensive operations, typical missions for a air assault operation are--

- **Seizure of vital ground.** The capture of such features as defiles, crossroads, and river crossings and protection of open flanks are seen to be important to the maintenance of the momentum of the advance. Ideally, such features should be taken before the enemy has had time to prepare their defense.
- **Conducting raids.** Raids would be launched against weapons of mass destruction, headquarters, communications centers, and logistics instal-

lation/depots. After destroying their target, such raiding parties would then harass the enemy rear until the OPFOR ground force advance reaches their area. They would not normally be extracted by air.

- **Blocking enemy reserves.** It may be necessary to block the approach routes of reserves or counterattack forces which might influence the outcome of the main battle.
- **Preventing withdrawal.** Ground forces would try to block the withdrawal routes of retreating enemy forces to aid their destruction, or to prevent their occupation of a potentially critical position.
- **Conducting a vertical envelopment.** Air assault forces may help to overcome the enemy defense by mounting an attack from the rear.
- **Seizing an airstrip.** The capture of an airfield or highway strip to land conventional forces. This would establish a foothold in the enemy's rear.
- **Conducting rear area operations,** such as an antilanding or rapid-reaction operations.
- **Blocking enemy attempts** to break out of an encirclement or reinforce a meeting engagement.

The OPFOR expects the air assault force to be threatened by superior enemy firepower and mobility after landing in the enemy rear. Therefore, the assault force generally requires external fire support and early linkup if it is to be recovered.

Conduct of Air Assault Operations

Planning

Air assaults supporting the offense exploit fleeting opportunities. In the de-

fense, they counter threats which suddenly materialize. Planning has to be rapid, thorough, and flexible. Planning begins with the selection of the objective. The responsible commander designates the objectives, one or more helicopter LZs at or near the objective, and a departure area for the force.

During the operations, helicopters should spend only a minimum of time in any one place. They are particularly vulnerable when stationary, either on the ground or hovering in the air. The pickup and landing of the assault force must be accomplished quickly, without confusion.

An assault unit, once on the ground in the enemy rear area, may be attacked from any direction by superior enemy forces. As a result, it is likely to require more external fire support than a regular infantry unit of similar size in standard configuration. During heavy engagement at close quarters, the basic load of ammunition can be exhausted very quickly.

Preparation

Infantry companies or battalions require a minimum of one day's training in preparation for air assault operations. Individual companies require 2 to 4 hours to practice loading and unloading procedures. Six or seven hours are required to rehearse the actions in the departure area before embarkation and those actions required after landing. Training stresses antitank tactics and other pertinent aspects of dismounted combat as well as set routines for troops in and around aircraft. Mockup helicopter fuselages may be used and certain individuals may receive additional specialized training in the tasks of loading and securing bulky items in the helicopter.

Company and battalion air assaults are practiced in training exercises at division level and above. The OPFOR have conducted heliborne air assault exercises that employed a mix of Mi-8/HIP and Mi-6/HOOK helicopters to land an infantry battalion in the enemy's rear.

Loading

The **departure area** is located approximately 20 km behind the line of contact to avoid enemy artillery fire. The departure area is large enough to allow troop dispersal. It contains subareas for helicopter pickup, disposition of troops, and units preparing to embark. The departure area is located where it can be masked from enemy observation by protective features of the terrain, and by camouflage and dispersal. Units which cannot be completely hidden from enemy reconnaissance should appear as small reserve or second-echelon units.

The **pickup zone** is located as close as possible to the departure area to minimize delay and confusion en route to the helicopters. A unit may move from its departure area to a short-term waiting area closer to the pickup zone. The waiting area also is camouflaged and allows for troop dispersal. It can be used to distribute special equipment and to receive specialist personnel attached to the force for the operation.

The force is prepared to load before the helicopters arrive. While waiting for the helicopters, the commander briefs his subordinates and joins the political deputy in exhorting the troops. The commander's final briefing includes recognition signals to be used between subunits and the plan for linking up with friendly forces. Staff officers responsible for communications and other services brief the force chief of staff.

Helicopter	Combat Radius	Payload
Mi-25/HIND D	160 km	8 x troops
Mi-8T/HIP E	200 km	24 x troops or 4,000 kg
Mi-8T/HIP C	200 km	24 x troops or 4,000 kg
Mi-17/HIP H	INA	24 x troops and 1,000 kg or 4,000 kg
Mi-6A/HOOK	300 km	65 x troops or 12,000 kg
Mi-26/HALO A	300+ km	Over 100 x troops or 20,000 kg

Figure 11-2. Helicopter lift capability.

The chief of staff has prepared and coordinated a detailed list, approved by higher authority, of what should be loaded into each helicopter.

Air Movement

Transport helicopters from either an combat/attack helicopter regiment or transport helicopter regiment can be used for heliborne operations. (See Figure 11-2.) Attack helicopters are capable of carrying some troops but are normally not used in that role.

Passive defense measures taken during the air movement phase include conducting movement during hours of darkness, using more than one flight route, maintaining radio silence, and flying at low altitudes. Some radioelectronic combat measures may be used during air movement.

Landing Zones

If undefended, the air assault lands on its objective if possible. If the objective is defended, the LZ should be as close and as advantageously placed as possible, but outside direct fire range. There would be at

least one alternate LZ and possibly multiple LZs for subunits of the force.

The commander is limited in his ability to reconnoiter LZs and routes to the objective. Usually he must depend on maps, aerial reconnaissance, and human sources such as prisoners or line-crossers. The terrain in question is likely to be beyond reach of ground reconnaissance patrols. Too obvious an air reconnaissance jeopardizes the chance of surprise. Minutes before the landing, an armed helicopter or other aircraft performs a final reconnaissance of the landing site.

In selecting the LZ, there are hazards to consider which may not be reflected on maps or aerial photography. The greatest danger is that the enemy, either through advance knowledge of the mission or by chance, could be in position to defeat the operation and would exploit his advantage fully. Another hazard may be undetected changes in the NBC situation in the LZ and the objective. Loosely packed snow, sand, or dust driven by rotor wash can obstruct pilot vision. Snow can hide hazards such as boulders and crevasses in the LZ. If a shortage of suitable terrain for landing exists, troops can be unloaded by using rope lad-

ders, by rappelling, or by simply jumping from a hovering helicopter.

While the operation as a whole may rely heavily on air and artillery support, the assault force primarily suppresses the enemy forces in the landing area. Helicopters at the LZ cover the off-loading operation with anti-tank guided missiles, free-flight rockets (both antipersonnel and antitank), and machine gun fire.

Troops leave the helicopter on order of the helicopter crew commander. Procedures are tightly regimented to get the troops and cargo away from the aircraft and away from the LZ without delay.

Objective

The objective normally is expressed in terms of terrain to be secured or an enemy unit to be neutralized. Ideally, it should be

relatively small and lightly defended, and have easy access. For example, an enemy tactical missile unit may be neutralized by destroying the launchers and guidance vehicles from ambush without attacking the enemy's garrison facility. The scheme of maneuver would be approved, if not dictated by higher authority. Once the operation begins, the assault force commander may refine the scheme of maneuver, if necessary, but makes as few changes as possible. The air assault mission ends with the arrival of a friendly ground force. The survival of the assault force may not be required for successful accomplishment of the mission.

While each phase of the operation is built on the success of the previous phase, the most critical moments occur in the movement from the LZ to the objective. In many situations, everything is staked on the success of the initial assault on the objective, made before the enemy reacts to the presence of the heliborne force.

Chapter 12

Naval Operations and Amphibious Landings

The OPFOR Navy possesses the strongest naval force in the geographic region. Its lead in naval power is not as secure as the State would like, however. It maintains a narrow lead in the geographic region and offers the State scant security against the naval forces of a first-class power from outside of the region.

The OPFOR has made significant strides in upgrading its naval capability from one which could barely patrol the shores of the State to a navy continually expanding in size and capability. The OPFOR is well on its way to possessing a navy capable of defending its own shores and projecting naval power in the region. This navy also possesses an amphibious landing capability and an amphibious support squadron. Several landing ships and landing craft provide the capability to transport a regular infantry battalion by sea with limited amounts of supplies and heavy weapons. The battalion is then landed unopposed in a preselected location. The loss of these transports would essentially prevent an amphibious landing larger than a company.

COMMAND, CONTROL, AND COMMUNICATIONS

The Navy is subordinate to the General Staff, Ministry of Defense. Organizationally, the Navy is a service equal to the Ground Forces and Air Force. Command is exercised by the Commander of the Navy. He is directly subordinate to General Staff, Ministry of Defense. Naval Headquarters is

collocated with the General Staff in the capital city. Afloat units are organized into squadrons according to vessel type, i.e., patrol torpedo, missile attack, etc.

In peacetime, there are no subsidiary headquarters. However, in time of war the Navy can be organized into two flotillas. The number and organization of flotillas is directly related to the lead time allowed for mobilization and to the prioritization of funds and mission. They would be structured to meet the strategic situation and naval mission. These flotillas would be commanded by the first deputy commanders of the Navy who locate their headquarters at a port facility. The Commander of the Navy determines the mission of each flotilla.

MISSIONS

The missions of the Navy are defensive in nature. Its primary mission is to defend the State from invasion by sea. The addition of an amphibious support squadron and missile and torpedo boats gives it a limited offensive capability. Current missions include defense of the coast from invasion by sea, surveillance of territorial waters to include rivers and lakes, and the prevention of infiltration and exfiltration by sea. The Navy also works closely with the Ministry of Interior to provide protection for merchant and fishing fleets, and to interdict smuggling operations.

Coastal Defense

Currently the Navy is best suited and equipped to conduct operations in shallow water. The anti-aircraft defenses of the naval craft further influence the restriction to shallow-water operations. This limitation often forces them to operate close to shore where land-based air defense systems and aircraft can provide air cover. The surface combatants of the Navy are backed up by a coastal defense missile system. A series of radar and visual observation posts provide warning of approaching naval forces. Shore-based antishipping missile sites along the coast and on off-shore islands provide the backbone of the coastal defense system. These units are part of the Navy's coastal defense squadron. The coastal defense squadron works very closely with Air Defense Command units to insure defense of the coast. Infantry units and antilanding forces may also serve as a reaction force to repel enemy landing attempts.

Mine Warfare

The Navy does not have sufficient surface forces to support a large-scale naval mining campaign. However, about one-fourth of the naval combatants can be readily equipped with mine rails which would make them capable of laying mines. The OPFOR Navy has a considerable inventory of shallow-water and land mines. The water mines are usable in fresh-water lakes and rivers as well as in coastal waters. The land mines are especially suitable for use on beaches.

Riverine Warfare

The Navy is also responsible for maintaining the national integrity and security of major inland waterways. Patrol boats

and amphibious vessels can mine waterways and combat enemy afloat or along the shores of rivers and lakes. Riverine craft may also be used to infiltrate and exfiltrate small special operations forces groups.

Antisubmarine Warfare

Some of the OPFOR surface vessels can be fitted with rails for launching depth charges. Although this gives the OPFOR a limited antisubmarine warfare capability, training and the propensity to operate in relatively shallow water indicates that OPFOR antisubmarine doctrine is probably in its formative stages. Primary antisubmarine concerns are for enemy diesel submarines which may be operating in shallow water along the coast.

AMPHIBIOUS LANDING OPERATIONS

The OPFOR does not have the capability to conduct opposed amphibious assault operations. It does, however, have the capability to transport a regular infantry battalion by sea and land it unopposed at a predetermined site, possibly well to the rear of the enemy. In some cases special operations forces, commandos, or airborne troops may be inserted in lieu of using conventional infantry.

Amphibious landings are small-scale landings conducted in **platoon, company or battalion strength**. These operations include raids, ambushes, reconnaissance, and assaults, with company- or platoon-strength operations being the norm. The Navy has an amphibious support squadron composed of several landing ships and landing craft. This squadron provides the capability to transport a regular infantry battalion by sea with limited amounts of supplies and heavy weap-

ons. The battalion is then landed unopposed in a preselected location. The loss of these transports would essentially prevent an amphibious landing larger than a company. The range of the insertion may extend to one-half the range of the naval transporting craft or to the edge of the air defense umbrella, depending on the situation. Transport craft are provided by the Navy.

Battalion-strength amphibious operations can be expected when the objectives are of critical value and the enemy surface warfare capability allows. Although these operations may be conducted independently of special operations or conventional forces, they may have air, naval gunfire, and missile support. These operations may have the following objectives:

- Conduct operations in concert with ground forces by outflanking or enveloping enemy positions along the coast.

- The seizure or destruction of ports, islands, peninsulas, and/or straits, radar sites, and other sensitive objectives. This is accomplished by conducting an unopposed surreptitious insertion within striking distance of the target.
- The interdiction of lines of communications within the coastal areas.
- Combined operations with or in support of airborne light infantry and special operations elements landed deep within enemy territory.
- Deception operations. Amphibious landings may be mounted as a feint to mislead the enemy about the main axis of advance.
- Blocking enemy reserves. It may be necessary to block the approach routes of reserves or counterattack forces which might influence the outcome of the main battle.

THIS PAGE INTENTIONALLY BLANK

Chapter 13

Partisan Operations

If insufficient force exists for the OPFOR to defend against an invader by conventional means, partisan actions would be used in an attempt to prevent occupation. This aspect of OPFOR military doctrine, termed **People's War**, envisions an unconventional war fought by thousands of small units and individuals against a foreign invader, eventually forcing the invader to withdraw from the country. At its core, **partisan warfare** is designed to wear an enemy down using sustained indirect methods when more direct forms of combat do not work or cannot be mounted. Although People's War is a much broader and comprehensive term, this chapter focuses on partisan fighting conducted in support of offensive and defensive conventional operations. Such actions may or may not be coordinated with concurrent conventional military operations.

OBJECTIVES

The strategic objective of the People's War is to prevent occupation of the country by defeating the enemy through a series of small combat actions aimed at attrition of his forces, or destruction of his command and control elements, lines of communication (LOCs), or logistics support. Immediate objectives are to destroy troops and equipment, disrupt LOCs, interdict supply sources, and disrupt movement and enemy use of airfields, ports, and landing zones.

TYPES AND STRUCTURES OF PARTISAN FORCES

Participants

Participants generally fall within one of three groups. These are--

- **Regular army units or subunits** that have been bypassed, fragmented, or otherwise attrited to a strength which does not allow them to continue their conventional mission.
- **Militia units or subunits** that have been bypassed, fragmented, heavily attrited, or have not had time to fully mobilize.
- **Civilians**, augmenting either regular army or militia forces, whose homes have been bypassed by enemy forces.

Maneuver Organizations

Given the circumstances under which the OPFOR would transition to and conduct partisan operations, most partisan units fighting in support of conventional operations are **ad hoc organizations**. It should be understood that any discussion of battalions and companies refers to like-sized units, and could include any or all of the participant groups listed above. For example, a partisan infantry "battalion" could be composed of two attrited regular army infantry companies, bypassed once their brigade's defense was penetrated, and two militia platoons from a nearby village defense, likewise bypassed.

The ability to organize forces into cohesive groups and conduct missions as described in partisan tactics depends on the size of the partisan force, its ability to establish the needed command and control, and the availability of combat support assets. Also, partisans organize their available maneuver forces based on the mission. Special maneuver groupings used for specific offensive or defensive missions are discussed at those places in the tactics section below.

Combat Support Organization

All of these organizations are composed of either regular army or militia. They are common to both offensive and defensive missions.

Artillery

Artillery support forces are formed from whole or partial mortar and artillery batteries. In all partisan units, these are known as **fire groups**, which differentiate them from the artillery groups which support districts, divisions, regions, and the expeditionary army. Within partisan operations, these groups are likely ad hoc organizations, as well. For example, a fire group supporting a partisan battalion could be roughly equivalent to a battery, but contain a mixture of indirect fire systems with differing capabilities. Fire groups support the main effort and sometimes security and flank elements.

Antitank

Antitank forces are an integral part of partisan operations. Ideally, antitank units supporting battalions are company-sized and units supporting companies are platoon-sized. Both are referred to as **antitank groups**. Groups function closely with artil-

lery and engineer elements, if present in the organization, to cover obstacles.

Air Defense

Shoulder-fired surface-to-air missiles found within infantry battalions would probably be part of the force. If available, however, larger air defense guns would be taken and integrated into the partisan defensive plan. Air defense weapons are placed around main forces, mortar positions, command posts, and observation posts. A basic partisan tactic is to use all available small arms to destroy enemy aircraft.

COMMAND, CONTROL, AND COMMUNICATIONS

Partisan units are **not subordinate to regular forces** when they conduct their operations. They attempt to establish communications and act in concert with them by carrying out missions in the enemy's rear that contribute to the overall objective of regular forces. However, in remote or mountainous areas, partisan forces may rely solely on their own internally developed command and control structure to plan and conduct operations. Whether operating independently or in concert with regular units, the common goal is coordination with all friendly forces in a given area, including the local militia and civilian population.

Because of tenuous communications links between partisans and regular forces, People's War doctrine stresses that insufficient knowledge of the situation or an absence of direction from higher should not halt actions. Among themselves, partisan units are more flexible than regular units and reestablish severed communications quickly, often by improvised field expedients. Partisan forces are grouped under a central com-

mand structure when several units operate in a small area or on a small number of interrelated objectives. When units operate over broader areas, when the situation is unclear or changing quickly, or when actions occur against several different targets or axes, partisan forces revert to more decentralized control.

All partisan organizations establish some type of **command posts**. Battalion-level organizations normally form a main command post. Depending on the mission and situation, the commander may establish a forward command post. Company and battery commanders have observation posts. Both command posts and observation posts are situated in concealed terrain with difficult access that offers protection against air and ground actions, especially helicopter and special-forces actions. Protection is also afforded by surrounding units. If partisans are operating in conjunction with militia, command posts may be situated near command centers of civilian political administrative elements, and may be colocated with them.

Partisan units may have several methods of communicating, including radios, landlines, and couriers. Partisan communications follow no set pattern. Radios are used as little as possible, especially during preparation for combat actions. Partisan forces mainly use standard military VHF radios, with relay stations on suitable elevations. They also use radio-telephone nets with repeater stations and integrate these with other nets. The aim is to use diverse and flexible communications paths, with telegraph and telephone routes as short as possible. Landlines are used frequently, especially during preparations for combat. Both military and civil systems are used and may be tied in with mobile communications centers. Landlines are also used in cities and

urban environments. Couriers are used constantly and are the primary method for communications during preparation for combat. Couriers interface with local communities and administrative bodies, and utilize local residents who know the area.

TACTICS

People's War doctrine emphasizes several attributes of partisan operations. Units must know the terrain and maintain maximum mobility, adapting quickly to new situations and tactics. Since the focus of action can change quickly, partisans must be able to change formations rapidly, secretly shifting from one area to another, while coordinating fires and movements. Leaders must make rapid decisions using initiative and ingenuity without waiting for orders from above. These attributes combine to force the enemy into an unfavorable position.

Partisan forces have several advantages over their enemy. Primary among these is the partisans' extensive knowledge of the State's terrain and their ability to successfully execute their unique missions in adverse weather conditions.

Effect of Terrain

Since difficult terrain is desirable for their operations, partisans attempt to fight from terrain in which the enemy's maneuver is canalized along valleys, canyons, rivers, and spread thinly on steep flanks. During movement in this terrain, enemy forces are forced to traverse dangerous areas such as bridges, mountain passes, tunnels, river fords, and narrow gorges. People's War doctrine acknowledges that enemy forces would make extensive use of helicopters and heliborne assaults in order to overcome

these danger areas. However, the doctrine emphasizes that enemy forces would eventually cluster along LOCs and at important objectives. Most potential enemy forces are not well organized for operations in mountainous or difficult terrain, and enemy coordination on different axes would be difficult. These realities favor partisan tactics. Partisans familiar with the terrain and possessing appropriate equipment are quite effective in this environment. They are more agile than regular forces. Partisan units generally avoid river crossings, easily trafficable terrain, and well-established roads. In urban areas, partisans avoid direct attacks on enemy positions, preferring to attack indirectly by surprise, and often at night.

Effect of Weather

Adverse weather effects support partisan operations. Persistent fog, rain, and snow, especially at higher elevations and in the mountains, have an adverse effect on sophisticated equipment. In winter, the combined effects of snow, ice, cold, and length of day tend to favor most partisan tactics. The enemy is quartered in houses, huts, and improvised shelters that require more security to avoid surprise. Because of shorter days, night operations are common because there is more time for action. At night, obstacles change importance and new ones arise. Movement is limited and more time is required for defenders to react. Bold, rapid strikes are easier, and losses from fire are lower.

OFFENSIVE OPERATIONS

Partisan-style operations do not fit into neat categories as regular force operations do. Traditional forms of attack and defense lend themselves readily to distinct missions. Partisan operations occur within

the context of regular operations, but blur traditional depths and frontages on the battlefield and change the nature of conflicts with their fluidity and complexity. In order to understand the range of partisan operations that the OPFOR may employ, some naming convention must be established. Offensive operations roughly fall into the following five forms: **raids**, **ambushes**, **direct attack**, **attack from the rear**, and **diversions**.

Raids

Raids are planned against a disorganized enemy, or in rear areas against vulnerable targets. Raids are often supported by small diversionary attacks. (See Figure 13-1.) The goal of a raid is to inflict losses and interfere with enemy missions. Most commonly, raids are conducted by **platoon- and company-sized** partisan forces against enemy forces that have bypassed them.

Raids are brief and quick operations, always using the element of surprise. Forces consist of one or more groups that hit, run, and hide. Usually at night or in adverse weather, small company-sized elements infiltrate enemy positions to attack soft targets, such as sentry positions, communications centers, convoys, logistics points, and rear areas. In conducting raids in enemy rear areas and along LOCs, partisans look to attack vulnerable points. In rear areas, where supply movements happen continually, partisans would target these and attack after a halt or rest stop, before security is in place. On well-established supply routes, raids would be common. Bridges, viaducts, culverts, and similar targets are quickly demolished with explosives. Cuts, defiles, and tunnels are caved in.

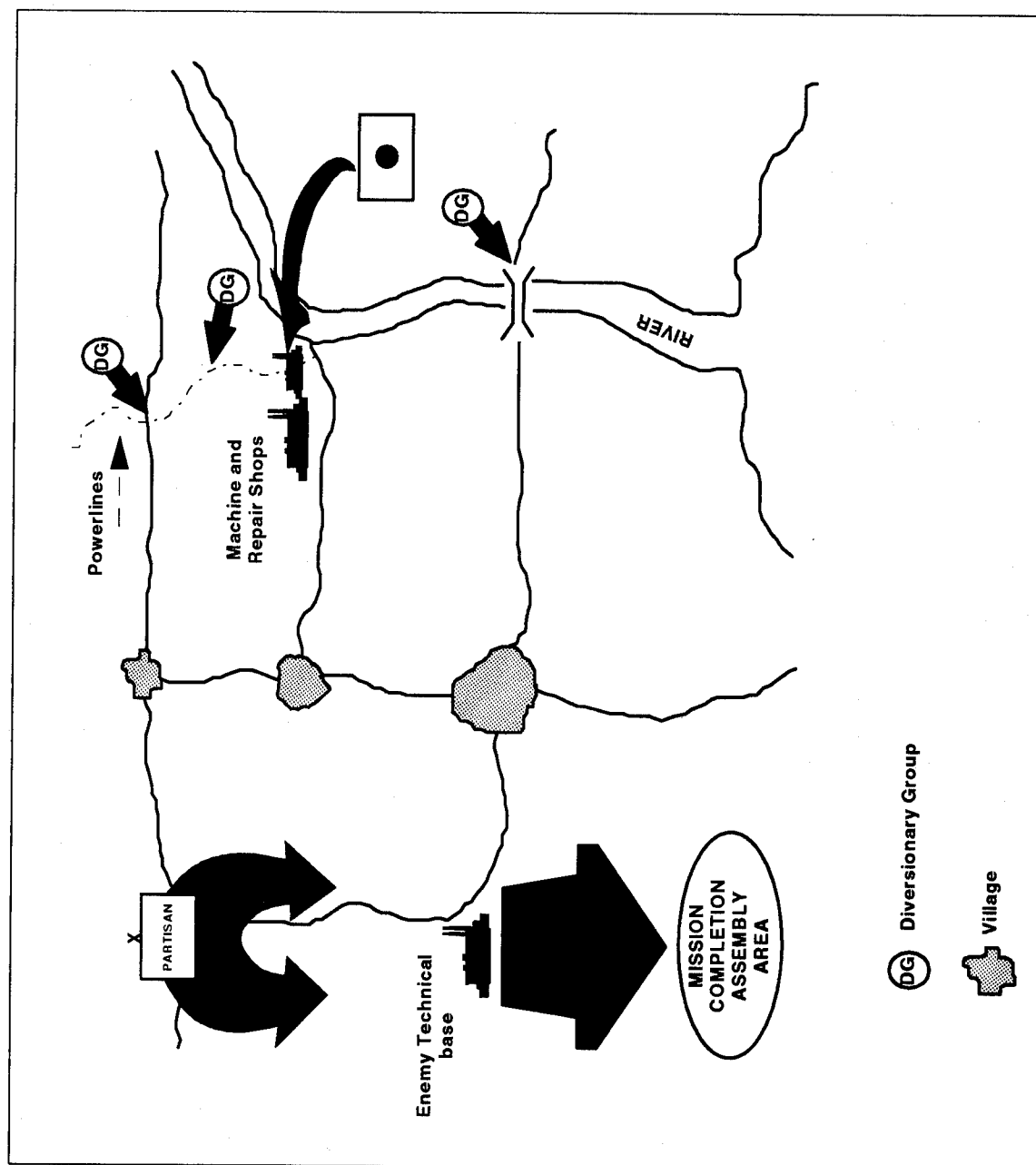


Figure 13-1. Raid.

In urban areas, a **penetration raid** is used when an enemy facility must be penetrated. The goal of a penetration raid is to destroy personnel and combat materiel, capture equipment and individuals, or free captives. Penetration raids are usually conducted by several strike groups.

By nature, raids are not decisive operations, but are designed to upset and demoralize enemy forces. Simultaneous raids are often conducted on several different targets over a wide area.

Ambushes

People's War doctrine stresses that small forces can produce big results during ambushes. Next to raids, ambushes are the most common and unnerving partisan tactic. The most common ambushes are conducted by **company-sized** elements, but ambushes by as few as **one or two partisans** are possible. Ambushes are set at unlikely locations where the enemy cannot bypass. They are conducted mainly at night, or during adverse conditions. Ambush forces are emplaced on hilly, mountainous, or forested terrain that provides cover and concealment. (See Figure 13-2.)

Ambush forces are positioned to cover the entire length of an enemy column. They may be positioned along one or both sides of a route. Forces are often organized into attack forces, security forces, obstacle/demolition forces, and a small reserve. This reserve is prepared to assault enemy flanking/security elements or reinforcements. Security forces hold key points to prevent enemy reinforcements.

The ambush is normally initiated with command-detonated demolitions to create obstacles that entrap enemy forces.

These demolitions take the form of directional mines along a route, incendiary devices, or explosives. Explosives are used to cause avalanches or rock slides, redirect torrents of water, obstruct tunnels, or destroy railroad tracks. The explosions signal attacking forces to fire into **kill zones**. After a brief heavy fire, attack forces assault across the kill zone to destroy remaining personnel and equipment.

Direct Attack

The direct attack is the **most decisive** form of action. The goal is to defeat enemy personnel and equipment. It is also more complicated to conduct than raids or ambushes, requiring a larger force capable of operating with greater synchronization.

Force Groupings

Within **battalion-sized** partisan infantry units, forces are organized into two attack groups: **forces for offense**, and **forces for attacking from the rear**. In many partisan attacks, both forces are committed simultaneously to confuse the enemy and cause him to fight in two directions. Within offense forces, elements may take the form of special penetration forces.

Penetration forces are formed when conditions are favorable for their employment. They may execute missions during attacks on cities, airfields, helipads, or LOCs; this is done in conjunction with main offense forces. Penetration forces may also target command posts, communication centers, logistics bases, and electronic warfare bases.

Within forces for attacking from the rear, special **diversionary forces** may be formed as separate, distinct elements. Their

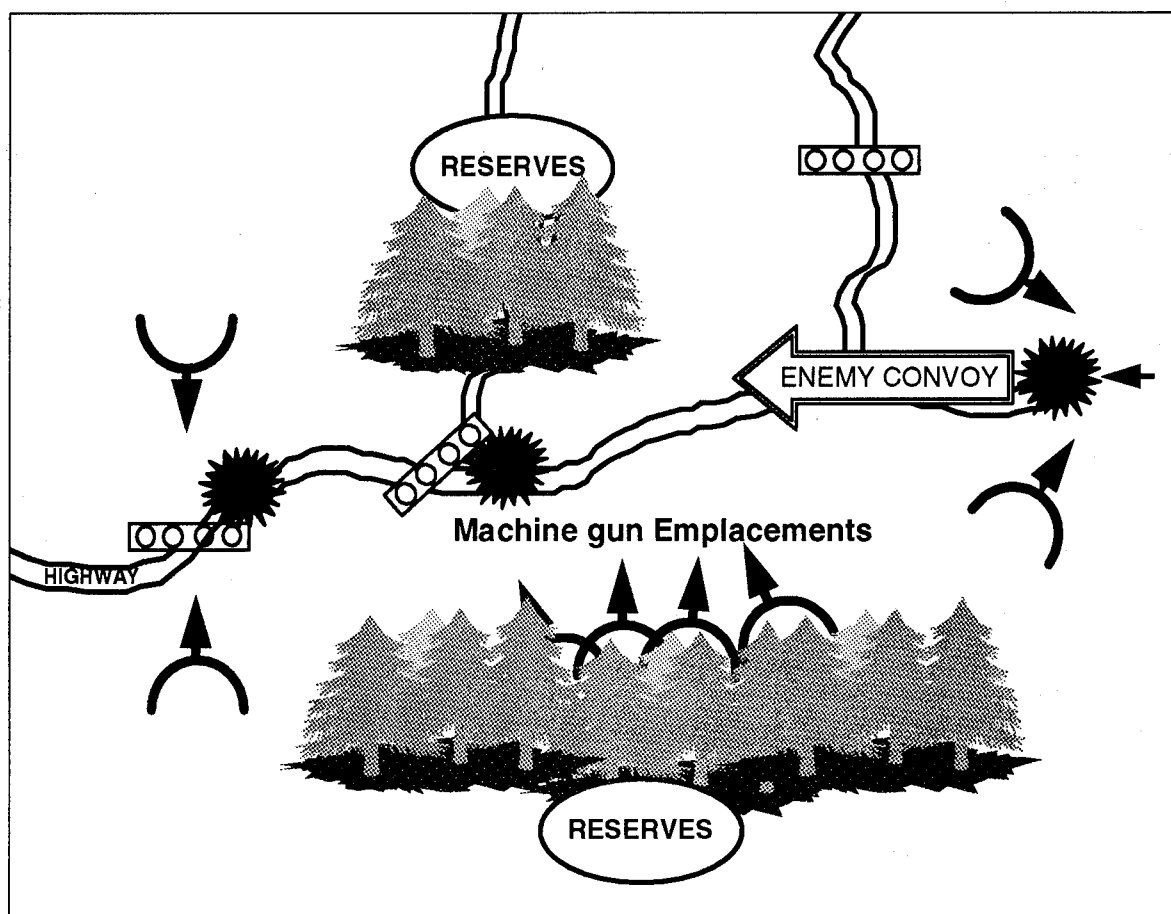


Figure 13-2. Ambush.

employment is especially important during actions in cities, LOCs, and airfields. Like other forces attacking from the rear, these elements confuse the enemy as to the location of the main attack.

Reserves are formed from remaining combat units. Their missions include expanding and consolidating success, blocking unexpected enemy actions, protecting partisan command posts, and defending against air assaults.

Reconnaissance and security forces protect the flanks of main offensive and defensive forces in the course of executing their missions.

Mortar Preparation

In conducting attacks, partisans often begin with a quick mortar barrage at short range. They do not begin attacks with heavy fire preparation. To gain surprise and avoid enemy counterfires, partisans then quickly attack the objective on multiple axes and engage in close combat. The duration of the mortar preparation depends on the time required to neutralize key targets. At the signal for the assault, guns in the fire group continue to fire on surviving targets and then shift fires to deeper targets ahead of friendly forces. Mortar and supporting artillery fire continues after the initial preparation and lasts until the accomplishment of the mission.

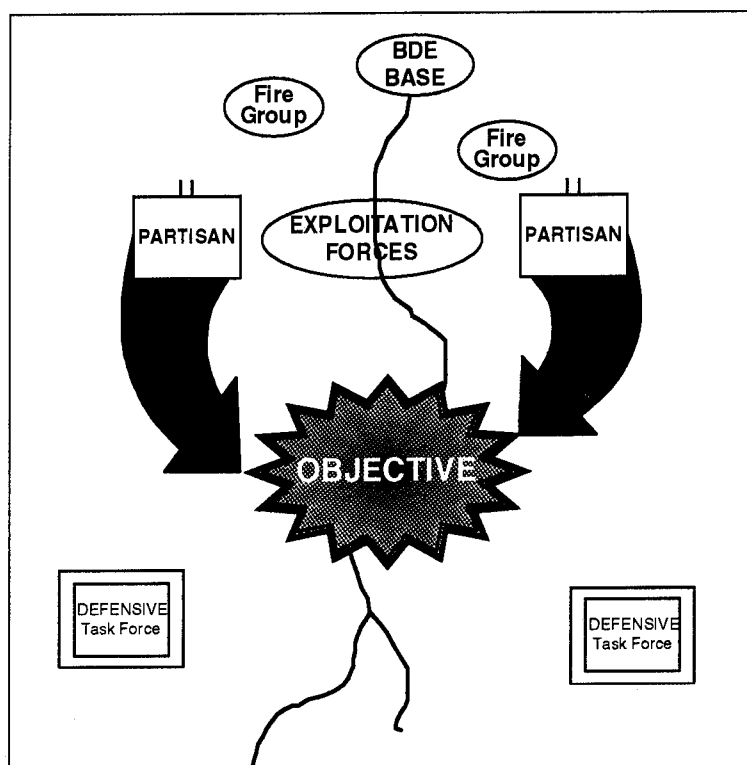


Figure 13-3. Direct attack.

Forms of Attack

In partisan operations, various forms of the direct attack are used. The **envelopment** is the most common form of direct attack. In the **deep envelopment**, partisans bypass strongpoints and main defensive belts to strike the enemy from rear area. In the **close envelopment** attack, forces attack directly, fixing enemy defensive positions. Separate enveloping forces maneuver through lightly defended axes on a flank to surround enemy positions. Both the deep and close envelopments require at least a **battalion-sized** partisan force and indirect fire support.

Another attack maneuver is the **concentric attack**, which often takes place at night. The concentric attack is used against enemy air assaults/airlandings, populated areas, airfields, helipads, smaller units at rest,

and isolated objectives, where partisans can completely surround the defender. Concentric attacks always involve **company-sized** elements that strike through enemy positions. These elements are known as **penetration forces**. Supporting forces fix enemy defenses and determine suitable avenues for penetration forces.

Attack from the Rear

The attack from the rear is often used **in conjunction with the direct attack**, since it causes the enemy to fight in two directions. It is used by itself when partisans perceive the enemy as having disorganized or weak defenses, especially in rear areas. When used by itself, partisans wait for darkness or adverse weather to gain an additional advantage. The goal of the attack from the rear is to disrupt LOCs and halt movements, block reinforcements and evacuation, create

or expand liberated territory, or focus from one LOC to another.

Diversion

The goal of a diversion is to keep the enemy in a state of uncertainty concerning the location of an OPFOR attack, or the actual focus of a main attack. Diversions are planned as part of deception operations **in support of direct partisan attacks**, especially in attacks on urban areas. **Diversionsary groups** are formed separately and inserted into enemy rear areas to strike power stations, helipads, transportation nodes, and choke points. Diversionary attacks normally precede main attacks in hopes that forces might be repositioned, reducing defensive belts for the main attack. They are conducted by **squad- to platoon-sized** elements. Targets for diversionary attacks are selected for their importance to enemy defense plans, their vulnerability and their accessibility. Diversionary targets are often lightly defended facilities that support urban infrastructures.

DEFENSIVE OPERATIONS

As in partisan offensive operations, it is difficult to categorize partisan defensive operations. However, the framework of defensive operations is composed of four defensive actions: **urban defense, delay, hasty defense, and withdrawal.**

Urban Defense

Partisans defend urban areas in the enemy rear using a mix of strongpoints and defensive zones. Normally, these defenses are conducted in towns that the enemy bypassed or took during the course of his advance. Partisans, usually composed of bypassed militia with some regular forces, es-

tablish the defense to deny the enemy control of this communications hub.

Defensive positions are clustered around key areas in the zone, such as refineries, transportation nodes, and communications elements. Minefields and obstacles are emplaced to maximize the tactical utility of existing buildings, waterways, and underground networks. Road networks and waterways are always key terrain in urban environments and would be defended heavily since they are normally the only means for enemy assaults to penetrate urban areas. Navigable rivers would also have a series of obstacles above and below the surface to deny enemy water craft and scuba operations. Artillery assets would be employed well forward in order to range approaching enemy formations or enemy positions in outlying areas. Mortars would be used more effectively because of the high angle of fire needed to clear built up areas. Air defense assets would be clustered around command and control nodes and may be emplaced in high rise buildings in order to maximize ranges to approaching enemy aircraft.

Delay

A partisan delay is usually in the form of **successive ambushes**. Delays by successive ambushes are normally organized and conducted by **battalion-sized** partisan forces in support of a larger battle, such as slowing the forward movement of an enemy's reserves. Successive ambushes are emplaced in areas which offer concealment and conditions for deployment, observation, and fire. Ideally, the enemy forces would be moving along avenues within highly restrictive terrain. Partisan units may assemble in a holding area from which they can quickly take up positions.

The goal of the **initial ambush** is to disrupt the enemy and cause him to deploy. Ambush forces quickly maneuver rearward or sideways to break off contact, and pass through **follow-on forces** occupying the next ambush site. This tactic is used to lure pursuing enemy forces into successive ambushes. A **reserve force** may be positioned in the gap between two ambush forces. Reserves are meant to counter air heliborne insertions and attack enemy flanks. If successive ambushes are emplaced out of contact with the enemy, or terrain in front of the first ambush cannot be observed easily, a **combat security force** is sent forward. This force, normally squad-sized, is used to alert ambush forces of approaching enemy elements.

When enemy forces arrive, the first ambush permits security elements to pass. The first ambush then hits the main body with heavy, surprise direct and indirect fires. If the enemy recovers and prepares an organized attack, initial ambush forces maneuver to the rear or flanks and break off contact. Retreating elements stay in contact until reaching the second ambush, being careful not to give away the area of the second ambush. Second and successive ambushes are emplaced along a delaying axis and conducted in the same manner as the initial ambush.

Hasty Defense

During movements, partisan elements may encounter unexpected enemy forces. When enemy forces are also in movement, partisans conduct a hasty defense. Lead elements establish hasty defensive positions and attempt to block enemy forward movement. Other partisan units attempt to move along enemy flanks and attack from the rear to fix the entire enemy element and allow main defenses to im-

prove. Fire support elements would establish hasty firing positions and attempt to target lead elements beyond the forward defense area.

Withdrawal

By nature, partisan operations require quickly executed withdrawals. Partisan units cannot reconstitute like regular forces. Partisans plan for hasty withdrawals to avoid heavy losses, or unexpected strikes during a combat phase. They would quickly abandon discovered positions and withdraw from positions when they are targeted by heavier forces. Most often, withdrawals occur during the course of a hasty defense or a defense of an urban area.

When a partisan unit is forced to withdraw, it breaks contact abruptly and, sheltered by antitank forces and hastily emplaced minefields, maneuvers to the side or rear, avoiding envelopment. It then organizes a defense at favorable positions in the rear, and plans a counterattack on enemy flanks. Withdrawal routes would often be chosen to lure a pursuing enemy into exposing his flanks. Obstacles and antitank ambushes would be planned along withdrawal axes. Planned withdrawals would normally be conducted at night. Planned withdrawals are also used to avoid envelopments by breaking contact suddenly. If partisan units are enveloped, they would likely attempt a swift breakout maneuver.

GLOSSARY

AA - antiaircraft
AAA - antiaircraft artillery
AAG - army artillery group
ADA - air defense artillery
ADC - Air Defense Command
ADV - advance
AF - air force
AM - amplitude modulated
APC - armored personnel carrier
AT - antitank
ATGM - antitank guided missile

BDE - brigade
BN - battalion
BrAG - brigade artillery group
BTRY - battery

CO - company
COMINT - communications intelligence
CP - command post

DAG - division artillery group
DECON - decontamination
DET - detachment
DF - direction finding
DG - diversionary group
DISINFECT - disinfection
DIV - division
DZ - drop zone

ECCM - electronic counter-countermeasures
ECM - electronic countermeasures
ELINT - electronic intelligence
ESM - electronic support measures
EW - electronic warfare
FD - forward detachment
FM - frequency modulated
FROG - free rocket over ground
FWD - forward

HF - high frequency

HQ - headquarters
HUMINT - human intelligence
HVY LIFT - heavy lift

IFF - identification friend or foe
INTCP - intercept
INTELL - intelligence

LOC - line of communication
LOS - line-of-sight
LZ - landing zone

M - militia
MAINT - maintenance
MDAG - military district artillery group
MECH - mechanized
MINDEF - ministry of defense
MININT - ministry of the interior
MOD - mobile obstacle detachment
MRAG - military region artillery group
MRL - multiple rocket launcher
MSB - materiel support brigade
MTZD - motorized

NBC - nuclear, biological, and chemical

OBJ - objective
OPFOR - Opposing Forces

PLT - platoon
POL - petroleum, oils, and lubricants

REC - radioelectronic combat
RECON - reconnaissance
REGT - regiment
RPV/UAV - remotely-piloted and
unmanned aerial vehicles
RSV - reserve

SAM - surface-to-air missile
SECT - section
SLAR - side-looking airborne radar

SOC - Special Operations Command

SPF - special-purpose forces

SPT - support

SQDN - squadron

SSM - surface-to-surface missile

SVC - service

SVCS - services

TK - tank

WPNS - weapons

INDEX

Page numbers in **bold type** indicate the main entry for a particular topic; this page often includes a definition of the indexed term. Due to slight adjustments in pagination after completion of this index, it is possible that, in a few cases, the indexed topic may start on the page before or after the page number shown here.

—A—

- Administrative march, 4-14
- Advance guard, **4-18**, 4-28
 - forward detachment, 4-22
- Aerial reconnaissance, 8-5
- Air accompaniment, 7-7
- Air assault operations, **11-8**
 - air movement, 11-11
 - command and control, 11-9
 - departure area, 11-11
 - depths, 11-8
 - helicopter lift capability, 11-11
 - landing zone (LZ), 11-11
 - loading, 11-11
 - missions, 11-10
 - objectives, 11-12
 - organization, 11-9
 - pickup zone, 11-11
 - planning, 11-10
 - principles of, 11-9
 - special equipment, 11-9
 - targets, 11-8
- Airborne brigade, **2-12**
- Airborne forces, 11-1
 - command and control, 11-1
- Airborne infantry brigade, 11-1
- Airborne operations, **11-1**
 - airdrops, 11-5, 11-6
 - air movement, 11-5
 - attack, 11-7
 - defense of objective, 11-8
 - drop zone (DZ), 11-4, **11-6**
 - final objectives, 11-7
 - landing zone (LZ), 11-5
 - linkup, 11-8
 - loading, 11-5
 - main assault force, 11-6
 - missions, 11-1
 - planning, 11-4
 - principles of, 11-4
 - reconnaissance and security force, 11-6
 - reorganization phase, 11-6
 - seizure of an airfield, 11-7
 - seizure of a river-crossing site, 11-7
 - support of expeditionary army offensive operations, 11-1
 - support of military region defensive operations, 11-3
- Air corridor, 7-9
- Air defense, 6-2, **7-7**
 - Air Defense Control Center, 7-8
 - air surveillance, 7-9
 - allocation of assets, 7-18
 - allocation of assets (defensive), 7-19
 - ambush, 7-19
 - deployment, 7-16, 7-18
 - early warning, 7-19
 - identification friend or foe (IFF), 7-9
 - phases, 7-8
 - planning, 7-15
 - radars, 7-10
 - roving units, 7-19, 7-20
 - strategic, 7-10
 - support for division defensive operations, 5-30
 - support for expeditionary army defensive operations, 5-25
 - support for military district defensive operations, 5-17
 - support for military region defensive operations, 5-10
 - support of partisan operations, 13-2
 - support in the defense, 7-19
 - support in the offense, 7-18
 - tactical, 7-15
 - tactical principles, 7-16
- Air defense artillery (ADA), 7-8
 - KS-19, 7-14
 - S-60, 7-11, 7-13, 7-17
 - ZSU-23-4, 7-17
 - ZSU-57-2, 7-13
 - ZU-23, 7-13
- Air defense artillery (ADA) regiment, 2-14, 7-10, 7-14
- Air defense battery
 - mechanized infantry brigade, 7-18
- Air Defense Command (ADC), 2-14, 3-14, 7-8, 7-14, 7-15, 12-2
 - command and control, 7-8
- Air Defense Control Center, national-level, 7-8

- Air defense regiment
 - district-level, 5-17
 - region-level, 5-10
- Air defense regiment (SA-6 or SA-8), 7-15, 7-17
- Air defense regiment (ZSU-57-2 or S-60), 2-14, 7-10, 7-14
- Airdrops, 11-5, 11-6
- Airfield, 7-1
- Air Force, 2-14, 7-1
 - air accompaniment, 7-7
 - air ambulance evacuation, 9-20
 - aerial reconnaissance, 8-5
 - area preparation, 7-6
 - aviation control element, 7-2
 - aviation counterpreparation, 7-7
 - combat/attack helicopter regiment, 7-1, 8-5, 11-11
 - command and control, 7-2
 - direct support to ground troops, 7-6
 - fighter-bomber regiment, 7-1
 - fighter-interceptor regiment, 7-1, 7-10
 - fixed-wing aircraft, 7-4
 - fixed-wing transport regiment, 7-1
 - forward air controller, 7-2
 - ground support, 7-3
 - helicopters, 7-1, 7-4
 - immediate air support, 7-4
 - independent reconnaissance aviation regiment, 8-5
 - jamming aircraft, 8-15
 - levels of combat readiness, 7-5
 - missions, 2-15, 7-4
 - on-call mission, 7-4
 - organization, 2-14, 7-1
 - planning, 7-5
 - preplanned mission, 7-4
 - rotary-wing aircraft, 7-1, 7-4
 - support for expeditionary army defensive operations, 5-25
 - support for the movement of troops, 7-6
 - support for military district defensive operations, 5-16
 - support for military region defensive operations, 5-10
 - support of air assault operations, 11-9
 - support of defensive operations, 7-3
 - support of offensive operations, 7-3
 - support of special operations, 10-2
 - transport helicopter regiment, 7-1, 11-11
- Airspace management, 7-9
- Air strikes, 6-2, 6-5
- Air superiority, 7-3
- Air support. *See* Air Force
 - in the defensive, 7-7
 - in the offensive, 7-5
- Air surveillance, 7-9
- Ambush
 - air defense, 7-19
 - commando, 10-9
 - partisan, 13-6, 13-9
 - reconnaissance, 8-13
 - special operations forces, 10-6, 10-7
- Amphibious assault. *See* Amphibious landing operations
- Amphibious landing operations, 12-2
- Amphibious support squadron, 12-1
- Antisubmarine warfare, 12-2
- Annihilation (fire support), 6-3
- Antiaircraft artillery (AAA). *See* Air defense artillery (ADA)
- Antilanding operation, 11-3
- Antilanding reserve
 - district-level, 5-15
 - division-level, 5-28
- Antitank
 - antitank reserve, 6-19
 - fire support plan, 6-19
 - organizations, 6-19
- Antitank battalion, 2-13, 6-20
 - district-level, 5-16
 - expeditionary army, 5-25
 - region-level, 5-9
- Antitank groups, 13-2
- Antitank reserve, 4-14, 6-19
 - district-level, 5-16
 - division-level, 4-26, 5-26
 - expeditionary army, 4-26
 - region-level, 5-10
- Antitank weapons, 6-1
- Area defense, 5-3
 - division-level, 5-25
 - expeditionary army, 5-17
 - military region, 5-5
- Armed conflict, 1-1
- Army. *See* Expeditionary army
- Artillery, 2-12, 6-1
 - allocation process, 6-10
 - artillery accompaniment, 6-18
 - artillery groups, 2-12, 6-11
 - artillery support of an attack, 6-17
 - attached, 6-10
 - barrier fire, 6-16, 6-18
 - controlling fire, 6-14
 - counterbattery fire, 6-13
 - defensive fire, 6-16, 6-18
 - fire assault, 6-14
 - fire concentration, 6-14
 - fire control, 6-12
 - fire groups, 13-2
 - maneuver by fire, 6-13, 6-18
 - massed fire, 6-15
 - movement, 6-17
 - observation posts, 6-12
 - offensive fires, 6-14
 - organization for combat, 6-10
 - organization for combat (defensive), 6-18

- organizations, 6-8
- preparatory fire, 6-17
- rapid fire, 6-13
- reconnaissance, 8-8, 8-10
- reconnaissance patrols, 6-12
- rolling barrage, 6-16
- rolling barrier fire, 6-17
- roving batteries, 6-19
- roving guns, 6-19
- standing barrier fire, 6-16
- successive fire concentrations, 6-15
- supporting, 6-10
- support of partisan operations, 13-2
- systematic fire, 6-13
- Artillery accompaniment, 6-18
- Artillery battalion, brigade-level, 6-10
- Artillery brigade, army- or national-level, 6-10
- Artillery groups, 2-12, **6-11**
 - army artillery group (AAG), 4-14, 5-24, **6-11**
 - brigade artillery group (BrAG), **6-11, 6-12**
 - division artillery group (DAG), 4-14, 5-28, **6-11**
 - in defense, 6-18
 - military district artillery group (MDAG), 5-16, **6-12**
 - military region artillery group (MRAG), 5-9, **6-12**
- Artillery reconnaissance, 8-10
- Artillery regiment
 - district-level, 5-16, 6-10, 8-10
 - division-level, 5-28, 8-10
 - expeditionary army, 8-8
 - region-level, 8-8
- Artillery support of an attack, 6-17
- Assassination, 10-6, 10-7
- Assault crossing battalion, 8-16
- Attack against a defending enemy, 4-26
- Attack from positions in direct contact, 4-27
- Attack from the march, 4-26
- Attack helicopter, 11-11
 - cross-FLOT operations, 6-2
- Attack zone, **4-32**
 - brigade, 4-23
 - division, 4-23, 4-32
 - expeditionary army, 4-32
- Aviation., *See* Air Force
 - fixed-wing, 6-1, 6-6
 - helicopter, 6-1
- Aviation control element, 3-15

—B—

- Barrier fire, 6-16, 6-18
- Battalion
 - medical section, 9-20
- Battlefield surveillance radar, 8-8, 8-10
- Biological warfare, 8-22

- Brigade
 - airborne, 2-12
 - air defense, 7-15, 7-18
 - attack zone, 4-23
 - brigade artillery group (BrAG), **6-11, 6-12**
 - chemical protection platoon, 8-23
 - divisional, 2-3, 2-9
 - forward air controller, 7-2
 - infantry, 2-9
 - light infantry, 2-6
 - light infantry militia, 2-11
 - mechanized, 2-5
 - mechanized infantry, 2-6
 - medical platoon, 9-20
 - motorized, 2-5
 - motorized infantry, 2-6
 - reserve, 2-7
 - separate, 2-3, 2-4, 2-5, 2-6, 2-9, 4-11, 4-12
 - separate infantry, 2-9
 - separate light infantry, 2-4
 - surface-to-surface missile (SSM), 2-13
 - tank, 2-10, 4-12
- Brigade artillery group (BrAG), **6-11, 6-12**
- Brigade defensive operations
 - frontage, 5-27

—C—

- Capital City, 7-11
- Capital Defense Forces, 2-11, 2-12, 3-2, 3-3, 4-1, 4-25, 5-7
- Capital District, 2-12, 7-2
- Chairman of the General Staff, 3-2
- Chemical
 - agents, 8-23
 - chemical and radiological observation posts, 8-8, 8-24
 - chemical protection troops, 8-23
 - chemical protection battalion, 8-23
 - chemical protection company, 8-8, 8-10, 8-23
 - chemical protection platoon, 8-23
 - chemical reconnaissance platoon, 8-10
 - delivery means, 6-2
 - munitions, 6-2, 8-23
 - reconnaissance, 8-8
 - targeting, 8-23
- Chemical protection battalion, 8-23
- Chemical protection company, 8-10, 8-23
 - expeditionary army, 8-8
- Chemical protection forces, 2-13
- Chemical protection platoon, 8-23
- Chemical protection reserve, 4-26
- Chemical protection troops, 8-23
- Chemical reconnaissance, 8-8, 8-10
- Chemical reconnaissance patrol, 8-12
- Chemical reconnaissance platoon, 8-10

- Chief of air defense, 3-12
- Chief of artillery, 3-8, 3-9, 3-12
- Chief of aviation, 3-12, 3-15, 7-2
- Chief of chemical protection, 3-12
- Chief of communications, 3-11
- Chief of engineers, 3-12
- Chief of intelligence, 3-10
- Chief of operations, 3-9
- Chief of personnel, 3-11
- Chief of reconnaissance, 3-10
- Chief of signal, 3-11, 3-12
- Chief of staff, 3-4, 3-8, 3-9, 3-14
- Chief of the communications section, 3-12
- Chief of the rear, 9-5, 9-23
 - expeditionary army, 9-11, 9-22
- Chief of the Rear (General Staff), 9-5
- Civil Defense Forces, 2-11, 2-15
- Close envelopment, 4-7
- Close operations, 4-23
- Coastal defense, 12-2
- Coastal defense squadron, 12-2
- Combat/attack helicopter regiment, 7-1, 8-5, 11-11
- Combat effectiveness, 1-7
- Combat engineer battalion, 8-19
- Combat engineer brigade, 8-16, 8-18
- Combat reconnaissance patrol, 4-22, 8-12
- Combat security outpost, 5-26
- Combat support operations, 8-1
- Combination pursuit, 4-31
- Combined arms reserve
 - division-level, 4-18
 - division-level (defensive), 5-26, 5-28
 - expeditionary army, 4-18, 4-25
 - military district (defensive), 5-11, 5-15
 - military region, 5-7
- Combined operations, 1-2
- Command and control, 3-1
 - chief of air defense, 3-12
 - chief of artillery, 3-8, 3-9, 3-12
 - chief of aviation, 3-12
 - chief of chemical protection, 3-12
 - chief of communications section, 3-12
 - chief of engineers, 3-12
 - chief of operations, 3-9
 - chief of signal, 3-11, 3-12
 - chief of staff, 3-4, 3-8, 3-9
 - commander, 3-3, 3-8
 - commander's decision, 3-14
 - command group, 3-8
 - communications, 3-5
 - deputy commander for the rear, 3-8, 3-13, 3-14
 - deputy commanders, 3-8
 - headquarters, 3-4
 - region- and district-level, 3-7, 3-15
 - staff, 3-4, 3-9
 - system, 3-3
- Command group, 3-8
- Command observation post, 3-5
- Command post (CP), 3-4
 - alternate CP, 3-5
 - command observation post, 3-5
 - forward CP (defensive), 5-11
 - main CP, 3-5
 - movement of, 3-4
 - rear CP, 3-5, 9-23
- Commander, 3-3, 3-8
 - army commander, 4-11
 - military region commander, 4-11
- Commander of the Air Force, 3-14
- Commander of the Armed Forces, 3-1, 3-2, 3-15
- Commander of the Ground Forces, 3-14
- Commander of the Navy, 3-14, 12-1
- Commander of the Special Operations Command, 3-14
- Commando battalion
 - composition, 10-7
 - district-level, 10-8
 - equipment, 10-7
 - military district, 8-10
 - missions, 10-7, 10-9
 - reconnaissance, 5-16
 - Special Operations Command, 2-15, 5-16, 8-5, 10-7, 10-8
 - training, 10-7
- Communications, 3-5
 - equipment, 3-6
 - nets, 3-7
 - principles, 3-5
 - skip echelon, 3-6
- Communications intelligence (COMINT), 8-4. *See* Radio reconnaissance
- Communications section, 3-11
- Concentration, 1-5, 4-5
- Concentric attack, 13-8
- Controlling fire, 6-14
- Coordination, 1-8
- Counterattack. *See also* Counteroffensive
 - expeditionary army, 5-30
 - fire preparation, 6-7
 - fire support, 6-7
 - helicopter support, 7-7
 - military district, 4-1, 5-11, 5-15
 - military region, 4-1, 5-7
 - strategic, 5-7
- Counterbattery fire, 6-13
- Counterinsurgency, 10-1, 10-7, 10-8
- Counter mortar/counterbattery radar, 8-8, 8-10
- Counteroffensive, 3-3
 - strategic, 4-1
- Counterpreparation
 - aviation, 7-7
- Counterpreparatory fire, 6-6
- Covering force (withdrawal), 5-31

—D—

- Deception, 8-15. *See Maskirovka*
- Decontamination, 8-24
- Deep battle, 4-2
- Deep envelopment, 4-7
- Defense belts, 5-20
- Defense lines, 5-6
- Defensive operations, **5-1**
 - area defense, **5-3**, 5-5, 5-17, 5-25
 - deliberate defense, 5-4
 - expeditionary army, 5-3, 5-4, **5-17**
 - fortified defense, 5-11
 - hasty defense, 5-4
 - military district, 5-11
 - military region, 5-5
 - missions, 5-1
 - mobile defense, 5-4
 - reasons for assuming defense, 5-1
 - territorial, 1-2
- Deliberate defense, 5-4
- Demolition (fire support), 6-3
- Deputy commander for the rear, 3-4, 3-8, 3-13, 3-14, 4-18
- Deputy ministers of defense, 3-2, 3-14
- Direct action, **10-1**, 10-6, 10-7, 10-9
- Direct attack, 13-6
- Direction-finding, 8-7
- Directorate of General Police, 2-15, **2-16**
- Directorate of Military Intelligence, **2-13**, 8-3, 8-6, 8-14, 8-15
 - operations battalion, 8-3, **8-6**, 8-9
 - radio reconnaissance battalion, 8-3, 8-7
 - reconnaissance and radioelectronic combat (REC) battalion, 8-3, **8-4**, **8-7**, **8-9**
- Directorate of State Security, 2-15, **2-16**, 8-3, 8-6
- Direct operations, 1-2
- Disease prevention, 9-21
- District. *See* Military district
- Diversionsary attack, 13-9
- Diversionsary forces, 13-6
- Diversionsary group, 13-9
- Division, **2-6**
 - antilanding reserve, 5-28
 - antitank reserve, 4-26, 5-26
 - area defense, 5-25
 - artillery regiment, 5-28, 8-10
 - attack zone, 4-23
 - categories, 2-6
 - chemical protection company, 8-10, 8-23
 - combat service support assets, 2-8
 - combat support assets (defensive), 5-28
 - combat support assets, 2-8
 - combined arms reserve, 4-18, 5-26, 5-28
 - defensive operations, 5-25
 - division artillery group (DAG), 4-14, 5-28, **6-11**
 - division commander, 2-4
 - engineer support, 8-19
 - first echelon (defensive), 5-27
 - forward detachment, 4-23, 4-24, 5-26
 - headquarters, 2-7
 - light infantry, 2-6
 - maintenance battalion, 9-16
 - maneuver assets, 2-7
 - manning levels, 2-6
 - march, 4-14
 - mechanized infantry, 2-6
 - medical battalion, 9-20
 - motorized infantry, 2-6
 - reconnaissance and REC battalion, 2-9, 4-18, 5-28, 8-9
 - reserve, 2-5, 2-6, 2-8
 - reserve division, 4-12
 - second echelon (defensive), 5-27
 - security zone, 5-26
 - standing, 2-3, 2-4, 2-5, 2-7, 2-8, 4-11
 - tactical formation, 4-23
 - tactical formation (defensive), 5-26
- Division artillery group (DAG), 4-14, 5-28, **6-11**
- Division attack
 - attack zone, 4-23, 4-32
 - commitment of second echelon, 4-24
 - mission depth, 4-33
- Division defensive operations
 - air defense, 5-30
 - area defense, 5-25
 - battalion defensive areas, 5-26
 - combat security outpost, 5-26
 - company/battalion-sized strongpoints, 5-26, 5-27
 - engineer support, 5-30
 - fire support, 5-28
 - first echelon, 5-27
 - forward detachment, 5-26
 - frontage, 5-26, 5-27
 - missions, 5-26
 - REC, 5-28
 - reconnaissance, 5-28
 - security zone, 5-26
- Divisional brigade, 2-3, 2-9
- Divisional light infantry brigade, 2-10
- Doctrine. *See* Military doctrine
- Drop zone (DZ), 11-4, 11-6

—E—

- Early warning, 7-19
- Echelonment. *See* Operational formation or Tactical formation
- Electronic counter-countermeasures (ECCM), 8-14
- Electronic countermeasures (ECM), 8-15. *See* Jamming
- Electronic intelligence (ELINT), 8-4. *See* Radar intercept and DF, or Radio reconnaissance

- Electronic support measures (ESM), 8-14
- Electronic warfare (EW). *See* Radioelectronic combat (REC), and Radio reconnaissance
- Enemy defenses, 4-31
 - partially prepared, 4-32
 - prepared, 4-31
 - unprepared, 4-32
- Engineer battalion, 8-8, 8-10, 8-16
 - expeditionary army, 5-25
- Engineer company, 8-19
- Engineer forces, 2-13
- Engineer reconnaissance, 8-8, 8-10, **8-20**
- Engineer reconnaissance patrol, 8-12
- Engineer reconnaissance platoon, 8-9, 8-10
- Engineer support, **8-16**
 - assault crossing battalion, 8-16
 - camouflage and deception, 8-22
 - combat engineer battalion, 8-19
 - combat engineer brigade, 8-16, 8-18
 - combat engineers (sappers), 8-16
 - defensive operations, 8-19
 - district-level, 8-19
 - district-level (defensive), 5-17
 - division defensive operations, 5-30
 - division-level, 8-19
 - engineer battalion, 8-8, 8-16
 - engineer company, 8-19
 - engineer reconnaissance platoon, 8-9
 - engineer reserve, 4-26
 - expeditionary army, 8-18
 - expeditionary army defensive operations, 5-25
 - fortifications, 8-20
 - gap crossing, 8-21
 - minefields, 8-21
 - movement support, 8-21
 - obstacle clearing, 8-21
 - obstacles, 8-21
 - offensive operations, 8-19
 - pontoon bridge regiment, 8-16, 8-18
 - reconnaissance, 8-8, 8-10, **8-20**
 - region-level, 8-18
 - region-level (defensive), 5-10
 - technical engineers, 8-16
 - technical tasks, 8-20
- Envelopment, 4-3, 4-6, **4-7**
 - air assault, 11-10
 - airborne, 11-3
 - close envelopment, 4-7, 13-8
 - deep envelopment, 4-7, 13-8
- Evacuation and treatment, 9-18
- Expeditionary army, 1-3, 2-3, **2-5**, 2-11, 3-3, 4-1, **4-10**, 5-1, 5-3, 5-4
 - antitank battalion, 5-25
 - antitank reserve, 4-26
 - area defense, 5-17
 - army artillery group (AAG), 4-14, 5-24, **6-11**
 - army commander, 2-5
 - army mobile logistics base, 9-11
 - artillery brigade, 6-10
 - artillery regiment, 8-8
 - chemical protection company, 8-8
 - chief of aviation, 7-2
 - chief of the rear, 9-11, 9-22
 - combat service support assets, 2-6
 - combat support assets, 2-6
 - combat support assets (defensive), 5-24
 - combined arms reserve, 4-18, **4-25**
 - commander, 4-11
 - defense belts, 5-20
 - defensive operations, 5-17
 - deputy commander for the rear, 9-11
 - engineer battalion, 5-25
 - engineer support, 8-18
 - field hospital, 9-20
 - field operating headquarters, 2-5
 - first echelon, 4-22
 - first echelon (defensive), 5-23, 5-27
 - forward detachment, 4-19, 5-21
 - headquarters, 2-5, 4-11
 - independent medical detachment, 9-20
 - logistics, 9-9, 9-11
 - main defense belt, 5-23
 - maintenance brigade, 9-16
 - maneuver assets, 2-5
 - maneuver forces, 4-11
 - materiel support brigade, 9-11, 9-14
 - mobilization, 4-1, **4-10**
 - offensive planning, 4-3
 - operational formation (defensive), 5-17
 - operational formation (offensive), 4-19
 - organization, 4-11
 - rear area commander, 9-11, 9-23
 - rear area security, 9-22
 - reconnaissance and REC battalion, 5-20, 5-24
 - reconnaissance staff, 8-6
 - second defense belt, 5-23
 - second echelon, 4-25, 5-23
 - smoke forces, 2-13
 - sustainability, 9-13
 - withdrawal, 5-31
- Expeditionary army defensive operations
 - air defense, 5-25
 - Air Force role, 5-25
 - area defense, 5-17
 - battalion strongpoints, 5-23
 - counterattack, 5-30
 - engineer support, 5-25
 - fire support, 5-24
 - forward detachment, 5-21

frontage, 5-17, 5-23
 main defense belt, 5-23, 5-27
 missions, 5-17
 Navy role, 5-25
 REC, 5-24
 reconnaissance, 5-20, 5-24
 second defense belt, 5-23
 security zone, 5-20, 5-27
 Expeditionary army offensive operations, 4-1, 4-10
 against extra-regional power, 4-33
 against regional power, 4-34
 airborne support, 11-1
 Air Force support, 7-5
 attack against a defending enemy, 4-26
 attack from positions in direct contact, 4-27
 attack from the march, 4-23, 4-26
 attack zone, 4-32
 close operations, 4-23
 envelopment, 4-3
 exploitation, 4-2
 extraterritorial offensive operations, 4-10
 forward detachment, 4-19, 4-32
 immediate mission, 4-33
 meeting engagement, 4-27
 mission depth, 4-32
 penetration, 4-2, 4-23
 phases, 4-1
 planning, 4-3
 preparation phase, 4-2
 pursuit, 4-2, 4-29
 rate of advance, 4-34
 reason for assuming offensive, 4-3
 reconnaissance, 8-3, 8-6
 subsequent mission, 4-25, 4-33
 Exploitation, 4-2, 4-7
 Extraterritorial offensive operations, 1-3, 2-5, 4-10. *See*
 Expeditionary army offensive operations

—F—

Field hospital, 9-20
 Field operating headquarters, 2-3, 2-5, 4-11
 Fighter-bomber regiment, 7-1
 Fighter-interceptor regiment, 7-1, 7-10
 Fire accompaniment, 6-5
 Fire assault, 6-14
 Fire concentration, 6-14
 Fire destruction of the enemy during the counterattack, 6-7
 Fire groups, 13-2
 Fire interdiction, 6-6
 Fire preparation for the attack, 6-4
 Fire superiority, 6-2
 Fire support, 6-1
 antitank, 6-19

defensive, 6-1
 division defensive operations, 5-28
 expeditionary army defensive operations, 5-24
 military district defensive operations, 5-16
 military region defensive operations, 5-9
 offensive, 6-1
 phases in defense, 6-6
 phases in offense, 6-3
 planning, 6-2
 target damage criteria, 6-3
 target priorities, 6-2
 targeting, 6-7
 Fire support for the attack, 6-5
 Fire support for the movement forward, 6-3
 Fire support of defending troops, 6-7
 Fire to repel the enemy attack, 6-6
 First deputy ministers of defense, 3-2
 Fixed-wing aircraft, 7-4
 Fixed-wing aviation, 6-1, 6-6
 Fixed-wing transport regiment, 7-1
 Flank attack. *See* Close envelopment
 Flank security element, 4-18
 Flexibility, 5-2, 9-3
 Flotillas, 12-1
 Fortified defense, 5-11
 Forward air controller, 3-15
 Forward detachment
 advance guard, 4-22
 combat reconnaissance patrol, 4-22
 commitment, 4-22
 district-level, 5-13
 division-level, 4-23, 4-24, 5-26
 expeditionary army, 4-19, 4-32, 5-21
 forward security element, 4-22
 main body, 4-22
 reconnaissance, 4-22
 Forward security element, 4-15
 forward detachment, 4-22
 Free rockets over ground (FROGs), 6-1, 6-2
 Frontal attack, 4-6
 Frontal pursuit, 4-29

—G—

General Staff, 1-4, 1-5, 1-6, 2-2, 2-3, 2-5, 2-6, 2-7, 2-8, 2-12, 2-13, 3-1, 3-2, 3-3, 3-8, 3-12, 3-15, 4-1, 4-3, 4-11, 4-12, 5-5, 5-17, 6-8, 6-10, 6-11, 6-12, 6-19, 7-1, 7-2, 7-3, 7-5, 7-14, 8-3, 8-6, 8-18, 9-5, 9-9, 10-1, 10-8, 12-1
 artillery brigade, 8-8
 Chairman of the General Staff, 3-2
 Chief of the Rear, 9-5
 Directorate of Military Intelligence, 8-3, 8-6, 8-9, 8-14, 8-15
 Operations Directorate, 3-15

national asset pool, 2-12, 8-16
Ground Forces, **2-2**
Guerrilla warfare, 1-1, 1-8, 1-9, **10-1**
Guerrillas, **1-9**

—H—

Harassment (fire support), 6-3
Hasty defense, 5-4
Headquarters, 3-4
 division, 2-7
 expeditionary army, 2-5, 4-11
 field operating, 2-3, 2-5, 4-11
 military district, 2-3
 military region, 2-2
 National, 2-2
 partisan, 13-9
 tactical field, 2-4
Heliborne operations, 11-11. *See* Air assault operations
Helicopter, 6-1, 7-1, 7-4
 attack, 6-2
 combat/attack helicopter regiment, 7-1, 8-5
 lift capability, 11-11
 Mi-6/HOOK, 11-9, 11-11
 Mi-8/HIP, 11-11
 minelaying, 7-7
 transport helicopter regiment, 7-1
Hospital, 9-20
Human-source intelligence (HUMINT), 8-3

—I—

Identification friend or foe (IFF), 7-9
Independent medical detachment, 9-20
Independent reconnaissance aviation regiment, 8-5
Independent reconnaissance patrol, 8-13
Infantry brigade, 2-9
 separate, 2-9
Infiltration, 4-6, 4-9
Initiative, **1-7, 4-4, 7-16**
Insurgency, **10-1**
Insurgents, **1-9**
Intelligence agents, 8-3, 8-6, 10-5
Intelligence section, 3-10

—J—

Jamming, 8-7, 8-14, 8-15
 self-screening jammers, 8-15

—K—

Kill zone, 5-26, 6-6, 6-7, 6-20, 13-6

—L—

Landing zone (LZ), 11-5, 11-11
Light infantry, 4-9
 brigade, 2-6, 2-10
 militia brigade, 2-11
 role in military district defensive operations, 5-13
 separate brigade, 2-4, 2-9
Light infantry brigade, 2-6
 divisional, 2-10
 separate, 2-4, 2-9
Light infantry division, 2-6
 engineer company, 8-19
Light infantry militia brigade, 2-11
Limited-objective attack/offensive, 4-1, 4-3
Line of communication (LOC), 4-18
 security, 4-18, 9-21
Logistics, **9-1**
 ammunition, 9-14
 army combat sustainability, 9-13
 army mobile logistics base, 9-11
 bases and depots, 9-2, 9-6
 battalion-level, 9-16
 battalion trains, 9-4, 9-13, 9-15
 brigade trains, 9-4, 9-13, 9-15
 centralized planning, 9-2
 chief of the rear, 9-5, 9-11, 9-22, 9-23
 command and control, 9-6, 9-23
 company-level, 9-16
 division trains, 9-13, 9-15
 expeditionary army, 9-9, 9-11
 forward distribution, 9-2, 9-6, 9-8, 9-12
 individual replacements, 9-3, 9-17
 maintenance, 9-1, **9-16**
 maintenance battalion, 9-16
 maintenance brigade, 9-16
 materiel support, **9-1**
 materiel support battalion, 13
 materiel support brigade, 10, 11
 medical support, **1, 18**
 military district logistics base, 9-7, 9-10
 military region logistics base, 9-7, 9-8, 9-9
 mobile stocks, 9-12
 national reserves, 9-4, 9-6
 operational reserves, 9-4
 operational-tactical, 8-6
 peacetime structure, 9-6
 POL, 9-15
 principles of, 9-2
 rear area commander, 9-5, 9-9, **9-23**
 rear command post (CP), 9-23
 rear depot, national-level, 9-6, 9-7, 9-8, 9-9
 reconstitution, 9-17
 reorganization, 9-17
 standardization, 9-3

- stockpiles, 9-3, **9-4**
- strategic, 9-5
- supply priorities, 9-3
- tactical, 9-13
- trailers, 9-3

—M—

- Main body (withdrawal), 5-33
- Main defense belt, expeditionary army, 5-23, 5-27
- Main defense line
 - military district, 5-14
 - military region, 5-6
- Main Military Council, 3-1, **3-2**, 3-14
- Maintenance, **9-1**
- Maintenance battalion, 9-16
- Maintenance brigade, 9-16
- Maneuver by fire, 6-13, 6-18
- March, **4-12**
 - administrative, 4-14
 - advance guard, 4-18
 - flank security element, 4-18
 - forward security element, 4-15
 - intervals, 4-15
 - maskirovka*, 4-15
 - movement support, 8-21
 - rate of, 4-12
 - rear security element, 4-18
 - security elements, 4-15
 - tactical, 4-14
- Maskirovka*, **1-6**, 4-15
- Massed fire, 6-15
- Materiel support, **9-1**
- Materiel support battalion, 9-13
- Materiel support brigade, 9-10, 9-11
- Mechanized brigade. *See* Mechanized infantry brigade
- Mechanized infantry brigade, 2-5, 2-6
 - air defense, 7-15
 - air defense battery, 7-18
- Mechanized infantry division, 2-6
 - combat engineer battalion, 8-19
 - engineer battalion, 8-10, 8-16
- Medical battalion, 9-20
- Medical platoon, 9-20
- Medical reserve, 4-26
- Medical section, 9-20
- Medical support, 9-1, **9-18**
 - disease prevention, 9-21
 - evacuation and treatment, 9-18
 - field hospital, 9-20
 - independent medical detachment, 9-20
 - medical battalion, 9-20
 - medical platoon, 9-20
 - medical section, 9-20
 - military medical service, 9-18

- Meeting battle, 4-27
- Meeting engagement, 4-14, **4-27**
- Mi-6/HOOK, 11-9, 11-11
- Mi-8/HIP, 11-11
- Military art, **1-3**
- Military district, **2-3**
 - air defense regiment, 5-17
 - air defense regiment (SAM), 7-15
 - antilanding reserve, 5-15
 - antitank battalion, 5-16
 - antitank reserve, 5-16
 - artillery regiment, 5-16, 6-10, 8-10
 - aviation control element, 7-2
 - combat engineer battalion, 8-19
 - combat service support assets, 2-5
 - combat support assets, 2-5
 - combat support assets (defensive), 5-15
 - combined arms reserve (defensive), 5-11, 5-15
 - commando battalion, 8-10, 10-8
 - counterinsurgency operations, 10-8
 - defensive operations, 5-11
 - deputy district commander, 2-4
 - district commander, 2-4, 2-7
 - engineer support, 8-19
 - first echelon (defensive), 5-14
 - fortified defense, 5-11
 - forward CP (defensive), 5-11
 - forward detachment (defensive), 5-13
 - headquarters, 2-3
 - "heavy", 2-4, 2-5
 - "light", 2-4
 - logistics base, 9-7, 9-10
 - main defense line, 5-14
 - maneuver assets, 2-4
 - military district artillery group (MDAG), 5-16, **6-12**
 - militia advisor, 2-11
 - operational formation (defensive), 5-12
 - reconnaissance and REC battalion, 5-12, 5-15, 8-9
 - region depot(s), 9-7
 - second echelon (defensive), 5-15
 - tactical field headquarters, 2-4
- Military district artillery group (MDAG), 5-16, **6-12**
- Military district defensive operations, 5-11
 - air defense, 5-17
 - Air Force role, 5-16
 - antilanding reserve, 5-15
 - antitank reserve, 5-16
 - company and battalion strongpoints, 5-14
 - counterattack, 5-11, 5-15
 - engineer support, 5-17
 - fire support, 5-16
 - fortified defense, 5-11
 - forward detachment, 5-13
 - frontage, 5-11

- main defense line, 5-14
- militia support, 5-13
- REC, 5-15
- reconnaissance, 5-12, 5-15
- second echelon, 5-15
- security zone, 5-12
- Military district logistics base, 9-7, 9-10
- Military doctrine, 1-1, 1-2
 - military aspect, 1-3
 - political aspect, 1-2
- Military region, 2-2
 - air defense, 5-10
 - air defense regiment, 5-10
 - antitank battalion, 5-9
 - antitank reserve, 5-10
 - area defense, 5-5
 - artillery regiment, 8-8
 - chief of aviation, 7-2
 - combat service support assets, 2-3
 - combat support assets, 2-3
 - combat support assets (defensive), 5-9
 - combined arms reserve (defensive), 5-7
 - commander, 4-11, 6-8, 9-9
 - defense lines, 5-6
 - deputy commander for the rear, 4-18
 - deputy region commander, 2-5, 9-9
 - engineer support, 8-18
 - field operating headquarters, 2-3
 - fire support (defensive), 5-9
 - first echelon (defensive), 5-6
 - headquarters, 2-2, 5-5, 9-9
 - line of communication (LOC), 9-21
 - logistics base, 9-7, 9-8, 9-9
 - logistics bases and depots, 9-6
 - main defense line, 5-6, 5-14
 - maneuver assets, 2-3
 - military region artillery group (MRAG), 5-9, 6-12
 - offensive planning, 4-3
 - operational formation (defensive), 5-5
 - operational reconnaissance, 8-6
 - rear area commander, 9-9
 - rear area security, 9-21
 - reconnaissance, 8-3
 - reconnaissance staff, 8-6
 - region commander, 2-5, 3-2
 - second defense line, 5-7
 - second echelon (defensive), 5-7
 - security zone, 5-6
- Military region artillery group (MRAG), 6-12
- Military region defensive operations
 - airborne support, 11-3
 - area defense, 5-5
 - counterattack, 5-7
 - defense lines, 5-6
 - fire support, 5-9
 - frontage, 5-5
 - main defense line, 5-6
 - missions, 5-5
 - operational formation (area defense), 5-5
 - second defense line, 5-7
 - security zone, 5-6
- Military region logistics base, 9-7, 9-8, 9-9
- Military science, 1-3
- Military strategy, 1-3, 1-4
- Military thought, 1-1
- Militia, 1-9, 2-10
 - combat service support assets, 2-11
 - combat support assets, 2-11
 - light infantry militia brigade, 2-11
 - maneuver assets, 2-11
 - militia advisor, 2-11
 - partisan operations, 13-1
 - reconnaissance role, 8-10
 - role in march security, 4-19
 - separate light infantry militia brigade, 2-11
- Minefields, 21
- Mines
 - scatterable, 6-1
- Minister of Defense, 3-1, 3-2, 3-15
- Minister for Foreign Affairs, 3-1
- Minister of the Interior, 3-1, 12-1
- Ministry of Defense (MINDEF), 1-4, 2-1, 3-2, 4-3, 7-2, 8-3, 8-6, 9-5, 10-7
- Ministry of the Interior (MININT), 2-2, 2-15, 3-2, 10-5, 10-7
 - Civil Defense Forces, 2-15
 - Directorate of General Police, 2-15, 2-16
 - Directorate of State Security, 2-15, 2-16, 8-3, 8-6
- Mission depth, 4-32
 - against extra-regional power, 4-33
 - division, 4-33
 - expeditionary army immediate, 4-33
 - expeditionary army subsequent, 4-33
- Mobile field bakery, 9-10
- Mobile obstacle detachment (MOD), 5-14, 5-26, 6-19
- Mobility, 1-4
- Mobilization, 3-2, 4-1
 - expeditionary army, 4-10
- Mortar battalion, brigade-level, 6-10
- Mortar battery, battalion-level, 6-10
- Motorized brigade. *See* Motorized infantry brigade
- Motorized infantry brigade, 2-5, 2-6
- Motorized infantry division, 2-6
 - engineer company, 8-19
- Motor transport battalion, 9-10
- Movement support, 8-21
- Multiple rocket launcher (MRL), 6-1, 6-2, 6-4, 6-5, 6-7, 6-10, 6-11, 6-21

—N—

National asset pool, 2-11
 National Command Authority, 9-4
 National Defense Council, 3-1, 3-2
 National Headquarters, 2-2, *See* National Military Command Authority
 National Military Command Authority, 3-1, 3-2
 Navy, 2-14, 12-1
 amphibious support squadron, 12-1
 antisubmarine warfare, 12-2
 coastal defense, 12-2
 coastal defense squadron, 12-2
 command and control, 12-1
 Commander of the Navy, 12-1
 equipment, 2-14
 fleets, 14
 flotillas, 12-1
 Headquarters, 12-1
 mine warfare, 12-2
 missions, 2-14, 12-1
 reconnaissance, 8-5
 riverine warfare, 12-2
 squadrons, 2-14, 12-1
 support for expeditionary army defensive operations, 5-25
 support for military region defensive operations, 5-10
 support of special operations, 10-2
 Neutralization (fire support), 6-3
 Norms
 operational, 4-31
 Nuclear, biological, and chemical (NBC) operations, 22
 decontamination, 8-24
 reconnaissance, 8-24
 Nuclear capability, 8-22

—O—

Offensive
 extraterritorial, 2-5
 Offensive operations, 4-1. *See* Expeditionary army
 offensive operations
 forms of maneuver, 4-6
 limited-objective attack/offensive, 4-1, 4-3
 Offensive planning, 4-3
 expeditionary army-level, 4-3
 region-level, 4-3
 strategic-level, 4-3
 Operational art, 1-3, 1-4
 principles of, 1-4
 Operational concept, 4-31
 Operational formation
 expeditionary army (defensive), 5-17
 expeditionary army (offensive), 4-19
 influence of nature of enemy defenses, 4-19

 military district (defensive), 5-12
 military region (defensive), 5-5
 Operational norms, 4-31
 Operational objectives, 4-31
 against regional power, 4-34
 Operational reconnaissance, 8-6
 priorities, 8-6
 Operations
 air assault, 11-8
 airborne, 11-1
 amphibious landing, 12-2
 combined, 1-2
 defensive, 5-1
 direct, 1-2
 extraterritorial, 1-3
 offensive, 4-1
 partisan, 1-2, 1-9, 13-1
 Operations battalion, 2-13, 8-3, 8-6, 8-9
 Operations Directorate, 3-15
 Operations order, 3-14
 Operations section, 3-9, 3-14
 Orders, 3-13
 operations order, 3-14
 warning order, 3-13
 Organizational structures, 2-1

—P—

Parallel pursuit, 4-29
 Partisan, 1-9
 Partisan attack
 attack from the rear, 13-8
 Partisan operations, 1-2, 1-9, 5-14, 5-15, 5-31, 13-1
 Partisan operations, 13-1
 air defense, 13-2
 ambush, 13-6, 13-9
 antitank groups, 13-2
 artillery support, 13-2
 command and control, 13-2
 command posts, 13-3
 communications, 13-2
 concentric attack, 13-8
 defensive, 13-9
 delay, 13-9
 direct attack, 13-6
 diversionary attack, 13-9
 diversionary forces, 13-6
 diversionary group, 13-9
 envelopment, 13-8
 hasty defense, 13-9
 kill zone, 13-6
 mortar preparation, 13-7
 participants, 13-1
 partisan infantry "battalion," 13-1

- penetration forces, 13-6, 13-8
- penetration raid, 13-6
- raid, 13-4
- reconnaissance and security forces, 13-7
- reserves, 13-7
- tactics, 13-3
- urban defense, 13-9
- withdrawal, 13-9
- Penetration, 4-2, 4-6, 4-9, 4-23
- Penetration forces, 13-6, 13-8
- Penetration raid, 13-6
- Personnel
 - individual replacements, 9-3, 9-17
- People's War, 1-1, 1-2, 1-7, 1-8, 2-10, 5-1, 5-31, 13-1, 13-2, 13-6
 - principles of, 1-8
 - strategic objective, 13-1
 - tactics, 13-3
- POL transportation battalion, 9-10
- Pontoon bridge regiment, 8-16, 8-18
- Preparatory fire, 6-17
- President, 3-1
- Pursuit, 4-2, 4-7, 4-29
 - combination, 4-31
 - frontal, 4-29
 - parallel, 4-29

—R—

- Radar
 - air defense, 7-10
 - battlefield surveillance, 8-8, 8-10
 - countermortar/counterbattery, 8-8, 8-10
- Radar intercept, 8-7
- Radar intercept and DF company, 8-4
- Radio and radar reconnaissance company, 8-4, 8-14
- Radio direction-finding (DF) company, 8-4
- Radioelectronic combat (REC), 8-14
 - deception, 8-15
 - division defensive operations, 5-28
 - expeditionary army defensive operations, 5-24
 - jamming, 8-14
 - military district defensive operations, 5-15
 - physical destruction, 8-15
- Radioelectronic combat (REC) company, 8-4
- Radio intercept, 8-7
- Radio intercept company, 8-4
- Radio reconnaissance battalion, 2-13, 8-3, 8-7
- Raid
 - commando, 10-9
 - partisan, 13-4
 - reconnaissance, 8-13, 8-14
 - special operations forces, 10-6, 10-7
- Rapid fire, 6-13
- Rate of advance, 4-5, 4-34
- Rate of march, 4-12

- Rear area command and control, 9-23. *See* Logistics
- Rear area commander, 9-5, 9-9, 9-23
- Rear area security, 9-10, 9-21
 - commando battalion, 10-9
 - expeditionary army, 9-22
 - military region, 9-21
- Rear command post (CP), 9-23
- Rear depot, national-level, 9-6, 9-7, 9-8, 9-9
- Rear guard (withdrawal), 5-33
- Rear security element, 4-18
- Rear services. *See* Logistics
- Rear staff, 3-4, 3-8
- Reconnaissance, 8-1
 - ambush, 8-13
 - artillery, 6-12, 8-8, 8-10
 - chemical, 8-8, 8-10
 - commando battalion, 10-9
 - detachment, 8-11
 - district-level (defensive), 5-12, 5-15
 - division-level (defensive), 5-28
 - engineer, 8-8, 8-10, 8-20
 - expeditionary army, 8-3
 - expeditionary army defensive operations, 5-20, 5-24
 - forward detachment, 4-22
 - group, 8-12
 - militia, 8-10
 - Navy assets, 8-5
 - NBC, 8-24
 - observation, 8-13
 - operational, 8-6
 - patrol, 8-12
 - principles of, 8-1
 - priorities, 8-6, 8-9
 - raid, 8-13, 8-14
 - reconnaissance staff, 8-6, 8-7
 - region-level, 8-3
 - region-level (defensive), 5-9
 - reserve, 8-2
 - special, 5-16, 8-10
 - strategic, 8-3
 - sweep, 8-13
 - tactical, 8-9
- Reconnaissance and radioelectronic combat (REC), 2-9, 2-13
 - district-level, 5-12, 5-15
 - division-level, 4-18, 5-28
 - expeditionary army, 5-20, 5-24
- Reconnaissance and radioelectronic combat (REC)
 - battalion, 2-13, 8-4, 8-7, 8-9, 8-14, 8-15
- Reconnaissance assault company, 8-4, 8-7, 8-8, 8-9, 8-10
- Reconnaissance company, 8-4, 8-8, 8-9, 8-10
- Reconnaissance detachment, 8-11
- Reconnaissance group, 8-12
- Reconnaissance patrol, 8-12
- Reconnaissance reserve, 8-2

Reconnaissance staff, 8-7
 expeditionary army, 8-6
 region-level, 8-6
 Reconstitution, 9-17
 Region. *See* Military region
 Reorganization, 9-17
 Reserve brigade, 2-7
 Reserve division, 2-5, 2-6, 2-8, 4-12
 Revolution, 1-2
 River crossing. *See* Gap crossing
 Rocket brigade (FROG), national-level, 6-8, 6-10
 Rocket launcher brigade (MRL), national-level, 6-8, 6-10
 Rolling barrage, 6-16
 Rolling barrier fire, 6-17
 Roving batteries
 air defense, 7-19, 7-20
 artillery, 6-19
 Roving guns
 air defense, 7-19, 7-20
 artillery, 6-19

—S—

Sabotage, 10-6, 10-7
 Sabotage agents, 10-6
 SAM. *See* Surface-to-air missile (SAM)
 SAM brigade (SA-11), 7-10, 7-13
 SAM brigade (SA-2), 7-10, 7-12
 SAM brigade (SA-3), 7-10, 7-12
 SAM brigade (SA-4), 7-10, 7-14
 SAM regiment (SA-6 or SA-8), 7-10, 7-12
 Scatterable mines, 6-1
 Second defense belt, expeditionary army, 5-23
 Second defense line, military region, 5-7
 Security echelon, 5-20
 Security zone, 5-4, 5-6, 8-8, 8-10, 8-11
 division-level, 5-26
 expeditionary army, 5-20, 5-27
 military district, 5-12
 Self-screening jammers, 8-15
 Separate brigade, 2-3, 2-4, 2-5, 2-6, 2-9, 4-11, 4-12
 Separate infantry brigade, 2-9
 Separate light infantry brigade, 2-4, 2-9
 Separate light infantry militia brigade, 2-11
 Side-looking airborne radar (SLAR), 8-5
 Signal forces, 2-13
 Smoke, 8-25
 Smoke forces, 2-13
 Sound ranging and radar reconnaissance battery, 8-8, 8-10
 Special operations, **10-1**
 Special operations battalion, 10-3
 Special operations brigade, 2-15, 8-5, **10-2**, **10-3**
 missions, 10-5
 Special Operations Command, **2-15**, 4-1, 8-5, **10-1**
 commando battalion, 2-15, 5-16, 8-5, **10-7**, 10-8
 equipment, 10-5
 Headquarters, 10-2

sabotage agents, 10-6
 special operations battalion, 10-3
 special operations brigade, 2-15, 8-5, **10-2**, **10-3**
 special operations team, 10-2, **10-3**, 10-6
 strategic reconnaissance, 10-6
 support of defensive operations, 10-7
 support of expeditionary army offensive, 10-6
 training, 10-3
 Special operations forces, 4-2, 7-3, 8-3, **10-1**
 Special operations team, 10-2, **10-3**, 10-6
 Special reconnaissance, 5-16, 8-10
 Special reserves, 4-26
 Special staff, 3-11
 SSM brigade (SCUD), national-level, 6-8, 6-10
 Staff, 3-4, **3-9**
 administration and finance section, 3-11
 branch chiefs, 3-12
 chief of air defense, 3-12
 chief of artillery, 3-12
 chief of aviation, 3-12, 3-15
 chief of chemical protection, 3-12
 chief of communications, 3-11
 chief of communications section, 3-12
 chief of engineers, 3-12
 chief of intelligence, 3-10
 chief of operations, 3-9
 chief of personnel, 3-11
 chief of reconnaissance, 3-10
 chief of signal, 3-11, 3-12
 chief of staff, 3-9
 communications section, 3-11
 coordinating staff, 3-9
 cryptographic section, 3-11
 deputy commander for the rear, 3-13, 3-14
 headquarters commandant, 3-11
 intelligence section, 3-10
 operations section, 3-9, 3-14
 personnel section, 3-11
 special staff, 3-11
 topographic section, 3-11
 Standing barrier fire, 6-16
 Standing division, 2-3, 2-4, 2-5, 2-7, 2-8, 4-11
 Strategic air defense, **7-10**
 assets, 7-11
 missions, 7-11
 Strategic counterattack, 5-7
 Strategic counteroffensive, 3-3, 4-1
 Strategic defensive, **3-3**
 Strategic ground operations, 3-3
 Strategic logistics, 9-5
 Strategic objective, 1-8
 Strategic offensive, **3-3**
 hostilities phase, 4-1
 phases, 4-1
 planning, 4-3

- post-hostilities phase, 4-2
- pre-hostilities phase, 4-1
- Strategic operation, 3-3
- Strategic reconnaissance, **8-3**, 10-6
- Strategic reserve, 3-2, 3-3, 4-1, 4-25
- Strategy. *See* Military strategy
- Strongpoint (defensive), 5-14, 5-23, 5-26, 5-27
- Successive fire concentrations, 6-15
- Supporting attack, 4-1
- Supreme High Command, 3-2, 3-3, 3-14, 3-15
 - Headquarters, 3-2
- Supreme High Commander of Forces, 3-1, 3-2, 3-3
- Surface-to-air missile (SAM). *See* SAM
 - SA-11/GADFLY, 7-13
 - SA-14/GREMLIN, 7-13, 7-18
 - SA-2/GUIDELINE, 7-11
 - SA-3/GOA, 7-11
 - SA-4/GANEF, 7-13, 7-17
 - SA-6/GAINFUL, 7-13, 7-17
 - SA-7/GRAIL, 7-13, 7-18
 - SA-8/GECKO, 7-13, 7-17, 7-19
 - SA-9/GASKIN, 7-17
- Surface-to-air missile (SAM) brigade, 2-14
- Surface-to-air missile (SAM) regiment, 2-14
- Surface-to-surface missile (SSM) brigade, 2-13, 6-1, 6-2, 6-4, 6-6, 8-15. *See* SSM
- Surprise, 1-6, 4-4, 7-16
- Sweep, 8-13
- Systematic fire, 6-13

—T—

- Tactical air defense, **7-15**
- Tactical field headquarters, 2-4

- Tactical formation, division-level (defensive), 5-26
- Tactical march, 4-14
- Tactical reconnaissance, **8-9**
- Tactics, **1-3**
- Tank brigade, 2-10, 4-12
 - air defense, 7-15
- Tank transport/heavy-lift battalion, 9-10
- Target damage criteria, 6-3
- Tempo, 1-5
- Territorial defense, 1-2
- Theater of military operations, **3-3**
- Trailers, 9-3
- Transport helicopter, 11-11
- Transport helicopter regiment, 7-1, 11-11
- Turning movement, 4-6, **4-8**

—U—

- Unconventional warfare, 4-1, 10-1

—W—

- War, **1-1**
- Warning order, 3-13
- Withdrawal, 5-31
 - helicopter support, 7-7
- Withdrawal (partisan), 13-9

—Z—

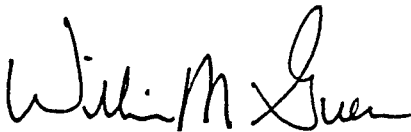
- Zone of advance. *See* Attack zone
- Zone of attack. *See* Attack zone

15 September 1994

The proponent of this pamphlet is the TRADOC Deputy Chief of Staff for Intelligence. This pamphlet is the definitive source for light OPFOR operational art for use at the Combat Training Centers and TRADOC centers and schools. It will also serve as the **coordinating draft** for a subsequent edition of the handbook in the form of a Department of the Army Information Pamphlet. Users are encouraged to send comments and suggested improvements on DA Form 2028 (Recommended Changes to Publications and Blank Forms) through channels to the TRADOC ODCSINT, Threat Support Division, ATTN: ATZL-CST, Fort Leavenworth Kansas 66027-5310. Suggested improvements may also be submitted using DA Form 1045 (Army Ideas for Excellence Program (AIEP) Proposal).

FOR THE COMMANDER:

OFFICIAL:



WILLIAM M. GUERRA
Colonel, GS
Deputy Chief of Staff
for Information Management

JOHN P. HERRLING
Major General, GS
Chief of Staff

DISTRIBUTION:
Special